

Appendix 8A-1: Drought-Related Press Releases



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
SFWMD Director of Communications
(561) 682-6171

Thursday, December 7, 2000

SFWMD DECLARES WATER-SHORTAGE EMERGENCY, IMPOSES RESTRICTIONS ON LOWER EAST COAST

Declaring a water-supply crisis that could continue for at least the next six months, South Florida Water Management District Executive Director Frank R. Finch, P.E., today signed an emergency order imposing mandatory restrictions on water use in Monroe, Miami-Dade, Broward and Palm Beach counties. The order takes effect 12:01 a.m., Friday December 8.

The **Phase 1** restrictions allow lawn watering and car washing only on Mondays, Wednesdays, and Saturdays from 4 a.m. to 8 a.m. for addresses that end in an odd number; Tuesdays, Thursdays, and Sundays, 4-8 a.m., for even-number addresses. The District expects these and other conservation measures to produce a 15 percent reduction in water use. Commercial establishments, such as car washes, that recycle water are not subject to these restrictions.

"Rain is what we need over Lake Okeechobee," Finch said. "The lake is 3.5 feet below normal for this time of year, and we have six months until the next rainy season. We've been watching the critical signals pointing toward a deepening regional water-supply crisis. We had to act now to get all South Florida residents into the mindset of conserving water now, because we've seen no drop in water use under the 'warning' we issued in September, calling for voluntary conservation."

(MORE)



SOUTH FLORIDA WATER MANAGEMENT DISTRICT

3301 Gun Club Road, West Palm Beach, Florida 33406 • (561) 686-8800 • FL WATS 1-800-432-2043 • TDD (561) 697-2574
 Mailing Address: P.O. Box 24680, West Palm Beach, FL 33416-4680 • www.sfwmd.gov

For more information, contact:

Ann Overton
 SFWMD Office of Communications
 (561) 682-6197

Wednesday, December 13, 2000

MEDIA ADVISORY

SFWMD TO HOLD WATER-SHORTAGE WORKSHOP FRIDAY TO TRAIN CITY/COUNTY LAW/CODE-ENFORCEMENT STAFF

WHAT: Water-shortage compliance and enforcement workshop, conducted by South Florida Water Management District

WHEN: Friday, December 15, 10 a.m.-noon

WHERE: Broward County Emergency Operations Center, 201 NW 84th Avenue, Plantation, (954) 831-3905 (on east side of Pine Island Road at the West Regional Courthouse Complex, just past the bus terminal)

FOR: All city and county law-enforcement and code-enforcement personnel from Monroe, Miami-Dade, Broward, and Palm Beach counties

WHY: The District last week declared Phase I restrictions on water use in those four counties. Under the District's emergency order and Florida law, the District is seeking cooperation and assistance from all local governments to enforce these restrictions. At this workshop, District staff will provide information on the restricted water uses and compliance and enforcement procedures.

For more information about the current water shortage, please see the District's web site at www.sfwmd.gov

###

GOVERNING BOARD

Michael Collins, *Chairman*
 President of D.A. Collins & Sons, Inc.

Vera M. Carter
 Gerardo B. Fernandez

Nicolas J. Gutierrez, Jr.
 Harkley R. Thornton

EXECUTIVE OFFICE

Frank R. Finch, P.E., *Executive Director*
 James E. Blount, *Chief of Staff*



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
SFWMD Director of Communications
(561) 682-6171

Tuesday, January 9, 2001

Press Conference
South Florida Water Management District
Briefing for News Media

What: Briefing for reporters and editors on the current water shortage restrictions imposed by the South Florida Water Management District.

When: Thursday, January 11, 2001, 3:30pm

Where: SFWMD headquarters, B-1 Lobby, 3301 Gun Club Road, West Palm Beach

Why: The lack of significant rainfall and the low level of Lake Okeechobee indicate a worsening regional water supply crisis. The South Florida Water Management District's Executive Director Frank Finch will be talking about the water restrictions and the current drought status.

More Information: AnEta Sewell, SFWMD Director of Communications, (561) 682-6171.



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
SFWMD Director of Communications
(561) 682-6171

Thursday, January 11, 2001

SFWMD IMPOSES MORE STRINGENT WATER RESTRICTIONS ON LOWER EAST COAST; ORANGE COUNTY ALSO FACES MANDATORY WATER USE CUTBACKS

Continuing declines in regional water storage supplies -- with no rainfall relief in sight and minimal reductions in water use -- prompted the South Florida Water Management District Governing Board to impose more stringent restrictions on water use in Monroe, Miami-Dade, Broward and Palm Beach counties. Today's Board action to place the Lower East Coast on Phase 2 water use restrictions takes effect at 12:01 a.m., Wednesday, January 17, 2001, for most of the region. For the cities of Belle Glade, Pahokee and smaller western cities surrounding the lake, the new restrictions will go into effect at 12:01 a.m. on January 19.

The Phase 2 restrictions limit lawn watering and car washing to two days per week: Wednesdays and Saturdays from 4 a.m. to 8 a.m. for addresses that end in an odd number; Thursdays and Sundays, 4-8 a.m., for even-number addresses. The restrictions apply to water supplied from utilities, as well as water taken from individual wells and surface water sources such as canals, lakes, ponds and rivers. Commercial establishments, such as car washes, that recycle water are not subject to these restrictions. Low volume pressure cleaning is also permitted.

For more information, contact: AnEta Sewell, Director of Communications, SFWMD, 1000 W. U.S. 1, Suite 100, West Palm Beach, FL 33416-4690 • 561-686-8800 Florida WATS 1-800-432-2045

The District placed west coast counties -- Lee, Collier, Hendry, Glades, and Charlotte -- under Phase 2 restrictions on November 29. That area remains under the same level of restrictions.

The District expects these and other conservation measures to produce significant cutbacks in water use, with a 30 percent reduction as an overall goal.

Reemphasizing predictions that -- without significant reductions in normal water use demands -- the current water-supply crisis could continue for at least the next five months, Executive Director Frank Finch explained the difficulties facing water managers as south Florida enters the height of the dry season.

The drought has become a statewide problem as every water district in Florida is dealing with the dry conditions. This is the worst drought condition we've seen since 1961 and is the second driest in our history. The driest year being 1938.

"This is the time of year when rainfall is at it's lowest and population is at it's highest. Also, below normal temperatures have prompted greater agricultural water use for freeze protection purposes. We are very concerned that dry vegetation increases the potential for uncontrolled wildfires," said Finch. "While some coastal areas have experienced localized rains that have helped groundwater and storage areas somewhat, we have not had any significant rains over Lake Okeechobee. The lake is 3.75 feet below normal for this time of year, and the conservation areas are rapidly falling. We must decrease our water use or we will be hard-pressed to ensure that regional water will be available to recharge south Florida's groundwater supplies when it is most needed."

Water use has remained generally consistent for the Lower East Coast despite declarations of water shortage warnings and mandatory Phase 1 restrictions. "This is the time for individuals and communities to step up to the plate and take a leadership role," said Finch. "The necessary ordinances must be in place and law enforcement personnel should be directed to actively enforce compliance with the water restrictions."

South Florida's lower East Coast water utilities depend directly on the aquifers for their primary supply and the water levels in these aquifers are below normal. The Everglades water conservation areas are the initial backup for the aquifers. Water levels in the conservation areas are also below average.

Lake Okeechobee is the backup water supply for both the conservation areas and the aquifers and a direct source for communities and businesses located around the lake. Its level is precariously low for this time of year, and past rains have been concentrated in coastal areas.

In late November, the District also imposed Phase 3 *agricultural* restrictions on the water deliveries that growers receive directly from the lake and Phase 1 restrictions for the towns surrounding Lake Okeechobee and non-agricultural users in that area. The non-agricultural users will now be included in the Phase 2 restrictions.

Based on significant rainfall deficits in the central part of the state and coordination with the Southwest and St. Johns River Water Management Districts, the Board also declared Phase 2 restrictions for the portion of Orange County within SFWMD boundaries. For public continuity and enforcement purposes, all Orange County residents and businesses will be expected to comply with St. Johns River water shortage cutbacks.

More information regarding the water shortage and Phase 2 restrictions are available 24 hours a day on the District's web site at www.sfwmd.gov. Citizens may also contact the SFWMD water shortage hotline at 1-800-662-8876. The special phone line is operational Monday through Friday from 8:30 a.m. to 4:30 p.m. Orange County citizens can also find water restriction information directly on the St. Johns River web site at <http://sjr.state.fl.us>.

###



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

Randy Smith
SFWMD Office of Communications
(561) 682-6197

Thursday, March 15, 2001

SFWMD MOVES TO PHASE 3 LEVEL WATER RESTRICTIONS; STEPS UP COMPLIANCE AND ENFORCEMENT

**Public meeting set for March 21;
Board to approve implementation plan March 27**

Shrinking regional water storage supplies and inadequate reductions in public consumption prompted the South Florida Water Management District Governing Board to authorize staff to move toward more severe water use cutbacks for portions of the Lower East Coast (Palm Beach, Broward, Miami-Dade and Monroe counties) and portions of the Lake Okeechobee Service Area (Lee County, Hendry and Okeechobee counties). The Governing Board vote was 7-2, with Trudi Williams and Hugh English voting against the motion.

The Board action directs staff to develop a detailed implementation plan to achieve Phase 3 level cutbacks (35-45% reductions) in water use. A public meeting is scheduled for March 21 to seek input from residents, businesses and utilities on operational and economic impacts. The details and specific locations of the tougher restrictions must be considered and approved by the Board on March 27. The new restrictions will be effective March 28.

In addition, the District is stepping up its own compliance and enforcement efforts – targeting large water users with aerial and on-site inspections, and issuing fines for documented violations. Also, the agency is launching a hard-hitting public information campaign to heighten awareness and to remind residents and businesses that “Wasting Water is a Crime.”

- more -

FOR MORE INFORMATION, CONTACT RANDY SMITH, SFWMD OFFICE OF COMMUNICATIONS, (561) 682-6197. E-MAIL: RSMITH@SFWMD.COM. FLORIDA WATER WATCH: 1-800-432-9045

Water Shortage Chronology

- **June 2000:** Staff began meeting with water users and began development of Water Supply Contingency Plan in response to potential start of a drought
- **September 2000:** **Water Shortage Warning** issued for Palm Beach, Broward, Miami-Dade and Monroe counties
- **October 2000:** Water Supply Contingency Plan approved, priority action items authorized, emergency funding approved
- **Nov. 29, 2000:** **Phase 3** restrictions placed on agriculture around Lake Okeechobee
Phase 2 water shorted ordered for Lower West Coast (Lee and Collier counties)
Phase 1 water restrictions imposed on municipal utilities withdrawing directly from Lake Okeechobee
- **Dec. 8, 2000:** **Phase 1** restrictions placed on Palm Beach, Broward, Miami-Dade and Monroe counties
- **Jan. 19, 2001:** **Phase 2** restrictions imposed for Palm Beach, Broward, Miami-Dade and Monroe counties
Phase 2 water restrictions imposed on municipal utilities withdrawing directly from Lake Okeechobee
Phase 2 restrictions for the portion of Orange County within SFWMD boundaries



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
SFWMD Office of Communications
Contact: Randy Smith
(561) 682-6197

Friday March 16, 2001

SFWMD Public Meeting Notice

The SFWMD will hold a public meeting on Phase III water shortage implementation, March 21, 2001, at 9:00 a.m. at the SFWMD Headquarters B1 Auditorium, 3301 Gun Club Road in West Palm Beach, Florida.

The purpose of the public meeting is to receive input from affected parties on the development and implementation of a strategy for imposing Phase III water shortage restrictions in portions of the Lower East Coast (Palm Beach, Broward, Miami-Dade and Monroe Counties) and portions of the Lake Okeechobee Service Area (Lee, Hendry, Glades, Highlands, Martin and Okeechobee Counties). Phase III water restrictions are scheduled to go into effect March 28, 2001.

Written comments should be submitted by email to pkochan@SFWMD.gov or mkirchho@SFWMD.gov or via telefacsimile to (561) 681-6274.

More information regarding the water shortage and water use restrictions is available 24 hours-a-day on the District's web site at www.sfwmd.gov.

Citizens may also contact the SFWMD water shortage hotline at 1-800-662-8876. This special phone line is operational Monday through Friday from 8:30a.m. to 4:30p.m.

###

3301 Gun Club Road, P.O. Box 24680, West Palm Beach, FL 33416-4680 • 561-686-8800 Florida WATS 1-800-432-2045



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

Office of Communications
Contact: Randy Smith
(561) 682-6197

Friday, March 23, 2001

Special SFWMD Governing Board Meeting March 27 at 10 a.m.

The South Florida Water Management District Governing Board will convene a special meeting on **Tuesday, March 27, 2001 at 10 a.m.** to discuss drought management issues. The meeting will be held in the SFWMD headquarters auditorium in West Palm Beach.

The SFWMD staff was directed by the Governing Board to seek public input and to develop a comprehensive drought management implementation strategy that:

- protects the water resources
- assures the equitable distribution of available water resources among all water users
- minimizes adverse economic, social and public health and safety issues associated with drought conditions
- enhances and protects available water supplies through increased storage and water conservation

The proposed plan will be presented to the Governing Board for review and action at Tuesday's special meeting. Any approved changes regarding water use restrictions would go into effect Wednesday, March 28, 2001.

The drought plan could affect portions of the Lower East Coast (Palm Beach, Broward, Miami-Dade and Monroe counties) and certain non-agricultural portions of the Lake Okeechobee Service Area (Lee, Hendry and Okeechobee counties).

Information regarding current water use restrictions is available on-line at www.sfwmd.gov. Citizens may also call 1-800-662-8876. The special phone line is operational Monday through Friday 8:30 a.m. to 4:30 p.m.

###

2001 Sun Club Road, P.O. Box 24690, West Palm Beach, FL 33416-4690 • 561-686-8800 Florida WATS 1-800-432-2045

MODIFIED PHASE II LAWN WATERING RESTRICTIONS HIGHLIGHTS**Under 5 Irrigated Acres**

For addresses ending in an odd number (1, 3, 5, 7 or 9) with an existing lawn UNDER 5 acres:

Lawn/landscape irrigation: Wednesdays and Saturdays from 4 a.m. to 8 a.m.

Spot watering: Any day, from 5 p.m. to 7 p.m., except Fridays

For addresses ending in an even number (0, 2, 4, 6 or 8) with an existing lawn UNDER 5 acres:

Lawn/landscape irrigation: Thursdays and Sundays from 4 a.m. to 8 a.m.

Spot watering: Daily, from 5 p.m. to 7 p.m., except Fridays

Over 5 Irrigated Acres

For addresses ending in an odd number (1, 3, 5, 7 or 9) with an existing lawn OVER 5 acres:

Lawn/landscape irrigation: Wednesdays and Saturdays from 12 a.m. to 8 a.m.

Spot watering: Daily, from 5 p.m. to 7 p.m., except Fridays

For addresses ending in an even number (0, 2, 4, 6 or 8) with an existing lawn OVER 5 acres:

Lawn/landscape irrigation: Thursdays and Sundays from 12 a.m. to 8 a.m.

Spot watering: Daily, from 5 p.m. to 7 p.m., except Fridays.

- MORE -

Modified Phase 2 Water Use Restriction Highlights for Homeowners**ODD-NUMBERED ADDRESSES (Example: 123 Drought Lane)**
WEDNESDAYS AND SATURDAYS

For addresses ending in an odd number (1, 3, 5, 7 or 9) with an existing lawn UNDER 5 acres:

Lawn/landscape irrigation: Wednesdays and Saturdays from 4 a.m. to 8 a.m.

Spot watering: Daily, from 5 p.m. to 7 p.m., except Fridays

For addresses ending in an odd number (1, 3, 5, 7 or 9) with an existing lawn OVER 5 acres:

Lawn/landscape irrigation: Wednesdays and Saturdays from 12 a.m. to 8 a.m.

Spot watering: Daily, from 5 p.m. to 7 p.m., except Fridays

EVEN-NUMBERED ADDRESSES (Example: 124 Drought Lane)
THURSDAYS AND SUNDAYS

For addresses ending in an even number (0, 2, 4, 6 or 8) with an existing lawn UNDER 5 acres:

Lawn/landscape irrigation: Thursdays and Sundays from 4 a.m. to 8 a.m.

Spot watering: Daily, from 5 p.m. to 7 p.m., except Fridays

For addresses ending in an even number (0, 2, 4, 6 or 8) with an existing lawn OVER 5 acres:

Lawn/landscape irrigation: Thursdays and Sundays from 12 a.m. to 8 a.m.

Spot watering: Daily, from 5 p.m. to 7 p.m., except Fridays

NEW LAWNS / LANDSCAPES – ALL ADDRESSES – DAILY EXCEPT FRIDAYS

For any address with a new lawn/landscape (in place less than 30 days) UNDER 5 acres:

Lawn/landscape irrigation: Daily, except Fridays, from 4 a.m. to 8 a.m.

Spot watering: Anytime / voluntary reductions

For any address with a new lawn/landscape (in place less than 30 days) OVER 5 acres:

Lawn/landscape irrigation: Daily, except Fridays, from 2 a.m. to 8 a.m.

Spot watering: Anytime / voluntary reductions

FOR MORE INFO: Citizens may call (800) 662-8876 for further clarification. The special phone line is operational Monday through Friday 8:30 a.m. to 4:30 p.m.

###



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
Office of Communications
Contact: Randy Smith
(561) 682-6197

Thursday, March 29, 2001

HOW THE MODIFIED WATER USE RESTRICTIONS WILL IMPACT THE TYPICAL SOUTH FLORIDA HOMEOWNER

New restrictions go into effect 12:01 a.m. April 2

The water use restrictions approved at the March 27 special SFWMD Governing Board meeting are designed to balance the need for significant cutbacks in water usage with input received from area governments, businesses and citizens. As South Florida continues to experience a severe water shortage, it is critical for residents to eliminate wasteful practices both outside and inside the home.

For a typical homeowner, the modified Phase 2 restrictions limit lawn watering to two days per week:

- Wednesdays and Saturdays, 4 a.m. to 8 a.m., for odd-number addresses
- Thursdays and Sundays, 4 a.m. to 8 a.m., for even-number addresses

Low volume, spot-watering -- using a hand-held hose with an automatic shut-off nozzle -- is allowed from 5 p.m. to 7 p.m. daily (except Fridays) for both odd/even addresses to provide a limited amount of irrigation water to isolated sections of landscapes such as brown patches in lawns and/or individual wilting plants. It is NOT permissible to use this allotted time for extensive irrigation purposes, and enforcement authorities are being instructed to ticket violators who abuse this privilege.

Vehicle/boat washing is limited to two days per week based on homeowner address:

- Wednesdays and Saturdays, 4 a.m. to 8 a.m. and 5 p.m. to 7 p.m., for odd-number addresses
- Thursdays and Sundays, 4 a.m. to 8 a.m. and 5 p.m. to 7 p.m., for even-number addresses

Washing must be done on, or drain to, a non-paved surface that permits water to soak into the ground. Also, a hose with an automatic shut-off nozzle must be used.

For a do-it-yourself homeowner, the use of a low-volume pressure cleaner to clean roofs, sidewalks or other structures is allowed only during the designated lawn irrigation/spot watering hours (the 4 a.m. to 8 a.m. odd/even address schedule and the daily -- except Friday -- 5 p.m. to 7 p.m. limited water-use time slot). Pressure cleaning by commercial/licensed individuals and companies is permitted any time.

NOTE: The SFWMD has requested that communities/municipalities and homeowner associations reconsider enforcing deed and code requirements for building and property "appearance" purposes during the water shortage. Wasteful and unnecessary use of water is prohibited.

To report water use violations, citizens should call their local police/code enforcement department or county sheriff.

- more -



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
Office of Communications
Contact: Randy Smith
(561) 682-6197

Tuesday, April 3, 2001

MODIFIED PHASE II WATER USE RESTRICTIONS IN EFFECT

How low-volume, spot watering conserves water

Despite recent rainfall, severe drought conditions continue throughout most of the South Florida Water Management District. Modified Phase II water use restrictions are in effect and designed to promote water conservation during this ongoing, serious water shortage. The restrictions are just one of six action items of the District's Comprehensive Drought Management Initiative plan passed last week at its special Governing Board meeting.

The modified lawn watering restrictions are specifically designed to discourage homeowners from operating their sprinkler systems on non-watering days for the sake of saving a few plants or a small patch of dry grass and wasting thousands of gallons of water. In addition to the two allowed irrigation days, the modified restrictions allow low-volume, spot-watering using a hose with an automatic shut-off nozzle from 5-7 p.m. any day except Fridays. It is **not** permissible to use the low-volume, spot watering time for extensive irrigation purposes. Enforcement officers are instructed to ticket violators who abuse this privilege.

"We're hoping to promote water conservation practices into everyone's daily lifestyle, and low-volume, spot watering is just one of them," said District Water Conservation Officer Bruce Adams. He added that homeowners could conserve even

- MORE -

more water by not watering for several days after a significant rainfall. "If roughly 500,000 home-sprinkler systems were turned off each time it rains, we could keep over 1 billion gallons of water in the aquifer, reducing the need to recharge our wellfields and further reducing the advance of saltwater intrusion, which threatens our utilities."

According to Adams, spot watering several plants or a few square feet of drought-stressed lawn uses only about 2 to 100 gallons of water. In contrast, operating an entire sprinkler system for a full cycle over 5,000 square feet (a typical South Florida property) uses about 1,000-5,000 gallons of water. "Preventing people from violating water restriction rules and operating their irrigation systems on non-allowed days is an enormous water savings," Adams said.

To keep lawns green, Adams offers these lawn-care tips that help conserve water:

- **Don't over fertilize**, especially with high nitrogen-based fertilizers because they promote more growth, demanding more water. While it is common practice to do spring fertilization in northern states, now is the worst time to fertilize in South Florida.
- **Don't scalp your lawn**. Set your mower at the highest level (3 ½ -4 inches), keep the blades sharp and mow more often. Taller grass promotes deeper roots and less water demand.
- **If you want to "green up" your lawn**, instead of using a high nitrogen-based fertilizer, spray it with an iron solution, which will enhance the appearance without extra growth or water demand. Apply with a hose-end sprayer available at most lawn and garden centers, during your allowable watering hours.

- MORE -

"This is the worst drought in Florida's history. South Florida's primary storage areas – Lake Okeechobee and the Water Conservation Areas – continue to fall at alarming rates," said SFWMD executive director Frank Finch. "To date, water use trends have not reflected the level of cutbacks we need to help get us through this emergency situation."

The District is looking for substantial cutbacks in water demand to help stretch dwindling water supplies.

For a typical homeowner, Phase 3 level restrictions limit lawn watering and car washing to one day per week. Based on input from Governing Board members and utility representatives, the specific days have yet to be determined. The restrictions apply to water supplied from utilities, as well as water taken from individual wells and canals, lakes or other surface water sources.

Phase 3 level restrictions also call for significant cutbacks by businesses such as golf courses, car washes and nursery/agricultural operations.

More information regarding the water shortage and water use restrictions is available 24 hours-a-day on the District's web site at www.sfwmd.gov. Citizens may also contact the SFWMD water shortage hotline at 1-800-662-8876. The special phone line is operational Monday through Friday from 8:30 a.m. to 4:30 p.m.

Reports of water use violations should be reported directly to the local law enforcement/code enforcement unit within the county or city municipality where the violation occurs.

#



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

"The time for warnings is over," said Powell. "Everyone should be aware of the water shortage and the importance of conserving our remaining supplies. Consistent enforcement of water shortage restrictions is critical to obtaining overall compliance from local residents and businesses."

While the District is authorized to patrol and enforce modified Phase II water restrictions that are in place for water use permit holders – high-volume water users such as golf courses, landscape nurseries and agricultural areas – it does not have the resources to employ certified law enforcement officers to patrol and enforce modified Phase II water shortage restrictions that effect the typical homeowner or small business. Because of this, the District is urging local government partners to help by stepping up enforcement to avoid Phase III restrictions or adverse impacts to the region's water resources.

The District also updated and simplified standardized water shortage violation tickets, which will be distributed at the workshops. Training on how to use the new tickets will also be provided to encourage consistency among law enforcement agencies.

For most homeowners and small businesses, water restriction violation fine amounts depend on local ordinances or codes, which vary by city and county. They generally range from \$25 to \$500. "We're encouraging law enforcement agencies to stop issuing multiple warnings and start ticketing," Powell said.

District Environmental Resource Compliance Department Director Robert M. Brown says the District is also beefing up enforcement efforts to catch and fine consumptive-use permittees, as well as those individuals who don't have permits. "We are not giving warnings at all," Brown said. "We issue fines immediately." He added that if large volume water use violators are caught without a permit at all, they will be fined at the second-offense level – up to \$5,000. District fines range from \$200 to \$10,000 per day, depending on permitted water allocation and number of offenses. Permit holders also risk having their permits revoked after a third offense. The District also beefed up its enforcement team by adding 40 staff members who use photography and other documentation to catch violators. "The District is not here to make money," Brown said. "We're here to comply with rules and protect our water supply."

To report a violation, citizens are asked to call their local law enforcement agencies, such as city or county police departments. A list of all local water restriction enforcement agency contacts can be found on the District's Web site at www.sfwmd.gov. To report a permit holder violation, citizens are asked to call the District directly at (800) 544-2333.

For more information on the water shortage and water restrictions, citizens may call (800) 662-8876 or visit the District's Web site. The special phone line is operational Monday through Friday 8:30 a.m. to 4:30 p.m.

###



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
Office of Communications
Contact: **Randy Smith**
(561) 682-6197, Pager (561) 607-3166

Monday, May 21, 2001

SFWMD TO HOLD DAILY WATER SHORTAGE NEWS BRIEFINGS

On Tuesday, May 22, the SFWMD will begin daily 11 a.m. news briefings regarding the critical water shortage drought situations. The briefings will be conducted in the District's Emergency Operations Center located on the third floor of the SFWMD headquarters at 3301 Gun Club Road in West Palm Beach.

Due to the increasingly dangerous drought conditions, the District is asking for the media's help in communicating emergency water management operating procedures implemented daily by the District.

"Priority Points" will be issued to the media addressing the most severe issues and actions of the day. Key District staff will attend the daily briefings with the media and will be available to answer questions about the current conditions and operating procedures being implemented.

###



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
Office of Communications
Contact: **Randy Smith**
Voice: (561) 682-6197
Pager: (561) 607-3166

June 1, 2001

SFWMD BEGINS BACK-PUMPING TO BOOST CRITICALLY LOW LAKE OKEECHOBEE

Substantial rainfall up to 2 inches recorded yesterday along with local maximum rainfall of 2 inches forecast for today in the Everglades Agricultural Area created the opportunity for the South Florida Water Management District to back-pump the rainfall runoff into Lake Okeechobee to boost its critically low water level of 9.02 feet above sea level and enhance water supply storage. The lake serves as the backup water supply system for most of the South Florida population, agricultural areas and the environment. District Executive Director Frank Finch gave the order this afternoon to start the back-pumping, which began at approximately 4:30 p.m. today.

"For the District to prepare for the next dry season and address the extreme water supply deficit caused by record low rainfall over the past 18 months, moving water from the south for storage in the lake is essential," Finch said. "Continued compliance with modified Phase II restrictions and water conservation even during the rainy summer months are also essential to help build up our water supply. It's going to take some time."

If Lake Okeechobee does not reach approximately 12 feet above sea level by November, a multitude of adverse impacts could result such as extreme residential and commercial water use restrictions, impacts to drinking water wellfields, loss of crops and livestock, irreversible saltwater intrusion damage to coastal wells, and impacts to threatened and endangered species.

Back-pumping is permitted by the Florida Department of Environmental Protection through an Emergency Order issued in April 2001 that allows the District to back-pump for water supply augmentation. The Order is designed to balance the protection of the lake with the need for water supply. The District is required to perform extensive water quality and biological monitoring during back-pumping events. In addition, the District is required to implement several mitigation projects and assist the DEP in a full assessment of any environmental impacts.

- MORE -

3301 Gun Club Road P.O. Box 24680 West Palm Beach, FL 33416-4680 • 561-686-8800 Florida WATS 1-800-432-2045



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
Office of Communications
Contact: Randy Smith
Voice: (561) 682-6197
Pager: (561) 607-3166

June 14, 2001

*****MEDIA ADVISORY*****

WATER SHORTAGE NEWS BRIEFINGS RESUME JUNE 15

The South Florida Water Management District will resume Weekly Water Shortage New Briefings regarding the ongoing water shortage Friday, June 15, at 11 a.m. in the Storch Conference Room at District headquarters at 3301 Gun Club Road in West Palm Beach. **The briefings are held every Friday at 11 a.m. until further notice.**

Key District staff will attend the briefings and are available to answer questions about the current water shortage conditions and operating procedures being implemented.

Reporters can connect to the teleconference briefings by calling **(850) 921-2591**.

###



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
Director, Office of Communications
Contact: **Randy Smith**
Office: (561) 682-6197
Pager: (561) 607-3166

September 17, 2001

WATER LEVEL IN LAKE OKEECHOBEE REACHES 13 FEET ABOVE SEA LEVEL Highest level since June 2000

As of September 17, 2001, Lake Okeechobee's water level is being measured at 13.09 feet above sea level and continues to rise in response to wet season rainfall. Today's measurement is approximately one foot above the recorded lake level of September 2000 yet continues to fall short of historical lake levels for this time of year.

In addition to the rains, the Lake's water level has benefited from an emergency order issued by the Florida Department of Environmental Protection allowing the backpumping of water into the Lake for water supply purposes. All backpumping events have been – and will continue to be – carefully monitored.

According to SFWMD Operations Director Tommy Strowd, "From a rainfall deficit perspective the drought appears to be over. From a water supply scenario, most of the District is reporting normal and above normal levels."

Water managers say conservation efforts remain a high priority. Below normal rainfall during the upcoming dry season could again trigger severe regional water supply concerns.

###



News Release

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

For more information contact:

AnEta Sewell
Director, Office of Communications
Contact: **Randy Smith**
Office: (561) 682-6197
Pager: (561) 607-3166

October 10, 2001

SFWMD Governing Board Calls for Continued Water Conservation; Mandatory Water Restrictions Lifted *Three-day-a-week lawn watering recommended*

Following on the heels of a record drought, the SFWMD Governing Board today adopted a resolution calling for year-round voluntary water conservation. The resolution recommends limiting lawn watering to three days a week and encourages local governments to continue effective conservation strategies. The Governing Board also removed mandatory water shortage restrictions in all areas except a portion of Orange County.

"Mother Nature has provided us a reprieve and that has allowed us to drop mandatory restrictions," said Trudi K. Williams, Governing Board Chair. "However, South Floridians need to do the right thing and continue with sound water conservation measures. Today, we are asking our local government partners to assist in implementing year-round water conservation practices."

The recent water shortage proved that South Florida lawns can be successfully sustained on less water. The District is asking that residents continue to follow a reduced lawn-watering schedule that helped conserve billions of gallons of water during the prolonged drought. Recommended watering days are: Monday, Wednesday and Saturday for addresses ending in an odd number; Tuesday, Thursday and Sunday for addresses ending in an even number. It is further recommended that no watering be done between the hours of 10 a.m. and 4 p.m. when temperature and evaporation are highest.

- more -

FOR MORE INFORMATION, CONTACT: RANDY SMITH, DIRECTOR OF COMMUNICATIONS, SFWMD, 1000 N. W. 10TH AVE., SUITE 1000, MIAMI, FL 33136. PHONE: (561) 682-6197. FAX: (561) 682-6198. E-MAIL: RSMITH@SFWMD.COM

An aggressive education and outreach campaign is planned to keep the conservation ethic a priority for South Florida. Efforts will include radio and television public service announcements, web site updates, displays and exhibits, printed materials and speaking engagements.

The Governing Board also authorized the creation of an internal team to develop a long-range water conservation plan. Eight existing employees – all with water conservation and outreach expertise – have been redirected to implement this key program. A primary focus will be the District's partnership role in the statewide water conservation initiative. The team will also explore advanced water-saving technologies, such as moisture-sensing soil probes used by the agricultural industry.

At today's meeting, the Governing Board also gave staff authority to initiate rule development regarding water conservation rules particular to permitting of major water users.

###

Appendix 8A-2: Drought-Related Editorials and Letters

[Note: Letters are presented from the former South Florida
Water Management District's Executive Director Frank Finch
and Governing Board Member Patrick Gleason.]

WATER RESTRICTIONS AND DROUGHT MANAGEMENT

By

Frank R. Finch, P.E.

South Florida Water Management District Executive Director

On March 27, the South Florida Water Management District governing board approved a comprehensive drought management plan to deal with a historic water shortage. They took these steps in lieu of “Phase III” water restrictions – draconian measures developed in 1981 and never before implemented.

Judging from newspaper coverage and editorials, which portrayed these actions as “backing down,” I believe the media has completely missed the point. Although questioning the Board’s motivations might make better copy, it does a disservice to the importance and the complexities of the problems.

The governing board approved a more sophisticated, more flexible approach that combines scientific modeling and analysis with real-world practicality and experience. Phase III continues to be a looming reality for all of us, and we now have defined scientific “triggers” for when to impose them.

The drought is not over. The March rains helped. And continued rains will continue to help. But it will take considerable time and rain to make-up the cumulative deficit and to shore-up regional storage. We have not – and will not – let our vigilance down.

Our bottom line remains protection of the resource.

So what DID the governing board do on March 27th?

Defined triggers. To make the drought management decision-making process as objective as possible, we established scientifically-sound, resource-based “triggers” to clearly define when harsher restrictions are needed.

Reduced allocations by 50% (saving about 7.5 billion gallons per month).

We took an “outside of the box” look at ways to increase supplies and decrease demands on our critically-low regional storage areas, such as a 50% reduction in water deliveries to some inland communities. This action will result in visibly lower canals, lakes and ponds, but will not impact drinking water supplies for these areas.

Provided assistance to “at-risk” utilities. We identified and developed corrective action measures and funding assistance for “at risk” utilities.

Increased public education and compliance/enforcement. Creation of a multi-jurisdictional “compliance/enforcement task force” will help reinforce the regional nature of the water shortage and the need to cutback water usage.

Considered public input. We met with local governments, industry / business groups and held public meetings to solicit input on the economic implications of our existing water restriction phases. Public comment was also taken at the governing board meeting prior to Board action.

Modified existing Phase II restrictions. The new restrictions are designed to balance the need to generate reductions in water use with the input received from government, businesses and citizens.

Homeowners are still limited to two-days-a week, 4 a.m. to 8 a.m. lawn watering based on address number. To prevent landscape die-off, spot watering with a hand-held hose or a watering can is allowed from 5 p.m. to 7 p.m. daily except Fridays.

Non-commercial pressure cleaning went from no restrictions at all to a limit of 20 hours a week.

For some water uses, the number of allowable water-use days increased, but the period of time allowed during each of those days decreased. Total weekly hours is the same...or less...than under the old Phase II.

Violations of any of the water use restrictions are subject to fines.

Conditions could change dramatically, for better or for worse, within a very short timeframe. We'll be ready to declare the "next level" of appropriate cutbacks when conditions warrant.

With the governing board's action, we now have a comprehensive, science-based plan of action to ensure that we can fulfill our job of protecting -- and stretching -- South Florida's limited water supplies during this severe water shortage.

#

SFWMD DECISION TO BACKPUMP IS JUSTIFIED

By

Patrick Gleason, Ph.D.

SFWMD Governing Board Member

The Post's recent news articles on the Lake Okeechobee backpumping issue did not take into consideration the severe water supply crisis affecting South Florida and the rest of the state. I would like to provide you an objective, more-balanced view of the South Florida Water Management District's decision to backpump stormwater into Lake Okeechobee.

South Florida is in the grips of a record-setting water shortage. Lake Okeechobee, our primary storage area, is more than four feet below normal and is expected to surpass the historic all-time low set in 1981. All three Everglades water conservation areas are at critically-low levels.

During a water shortage, rainfall is obviously at a premium. Capturing and storing rainfall – when it does happen – is a responsible, and expected, water management action.

While the best-case scenario is for the needed rain to fall directly over our regional storage areas, that doesn't always happen. That's why South Florida's network of flood control canals, levees, structures and pumping stations are also designed to help catch and move water into storage for water supply purposes.

Right now, that capacity is somewhat limited. A key component of our long-term Comprehensive Everglades Restoration Plan includes changes to the existing water management system to further increase water storage. The recent decision to backpump water is based on the critical need to enhance storage, particularly when water is scarce.

To take advantage of rain that falls just south of Lake Okeechobee – stormwater runoff that would normally flow into canals and then follow gravity flow to the south – the SFWMD has the capability to “backpump” the extra water north into the lake.

The governing board endorsed a comprehensive drought management strategy that includes emergency water supply backpumping. We did not make this decision lightly. We recognize the potential environmental effects of this action and have built-in operating, monitoring and reporting protocols to minimize adverse impacts to the ecosystem.

It is important to note that the expected amount of nutrients entering the lake through this particular water supply-enhancement effort is small when compared to the other nutrient inputs to the lake -- direct rainfall, runoff and inflows from north of the lake. Another key point is that the excess water has to be captured and stored someplace. With our current system, those options are north to the lake or south to the Everglades. Both ecosystems are subject to changes in nutrient-level balances. In a severe water shortage, the lake is the most efficient regional storage area we have.

Given the environmental concerns, why endorse backpumping? The lake is the back-up water supply source for the Everglades water conservation areas and recharges the Lower East Coast's underground aquifer system. It also helps combat saltwater intrusion into Lee County and the City of Fort Myers utility in-takes.

The lake is the direct source for communities and businesses located around the lake -- South Bay, Bryant, Clewiston, Pahokee, Belle Glade and Okeechobee. Because the lake level is so low, these utilities are considered imminently "at risk" because their intake facilities may be unable to pull water for treatment and delivery of drinking water to lakeside residents. In addition to the backpumping efforts to increase storage in the lake, the SFWMD also has authorized technical assistance and \$600,000 in funding to ensure that these utilities -- and the 50,000 customers they serve -- will have water when needed.

As the back-up supply for most of Lower East Coast and some Lower West Coast wellfields, many other utilities in South Florida are also considered "at risk" due to the regional storage deficit. Those include: Lee County, Fort Myers, Riviera Beach, Lake Worth, Lantana, Manalapan, Highland Beach, Deerfield Beach, Hillsboro Beach, Pompano Beach, Dania, Broward System 3A, Hollywood, Hallandale, Miami-Dade/Rex, Homestead, Florida City and the Florida Keys Aqueduct Authority.

These communities will be the first to rely on the need for replenishing water from Lake Okeechobee if the drought continues ... or worsens.

Water management is a daily balancing act. While consideration of our four interrelated mission elements (water quality/flood control/natural systems/water supply) is always at the forefront of our policy-setting and decision-making actions, the “weighting” of the factors changes from time to time.

Water management is also dealing with realities. And the reality is that to effectively manage a severe water shortage, we have to expect some trade-offs. Our job is to ensure that these lakeside and other at-risk communities will have water today... and tomorrow. Backpumping -- as one component of a comprehensive drought management plan -- is an appropriate course of action.

###

Appendix 8A-3: Drought-Related Press Releases on Water Shortage

SOUTH FLORIDA WATER MANAGEMENT DISTRICT

WEEKLY WATER SHORTAGE NEWS BRIEFING PRIORITY POINTS

June 15, 2001

At today's South Florida Water Management District water shortage news briefing at District headquarters in West Palm Beach, staff issued these key points:

Lake Okeechobee water levels remain steady. Today's Lake elevation is 9.13 feet above sea level. No significant elevation of the lake level is expected during the next few weeks. Pumping from Lake Okeechobee for agricultural use has subsided due to rainfall amounts in the Everglades Agricultural Area. Pumping rainfall runoff into the lake for water supply augmentation is occurring on a regular basis. The pumping has been for short periods and low volumes and is expected to be a continuing process during the wet season.

The Upper Kissimmee Basin, normally a source of rainfall runoff into Lake Okeechobee, is very dry. No major rainfall has been recorded in that area meaning Lake Okeechobee is receiving no water supply from its north side.

Along the Lower West Coast and Lower East Coast, groundwater supplies are near normal and are being replenished by daily rainfall. Canals are at their normal elevations. Rainfall runoff in the canals is released to the ocean when necessary during rainfall events to prevent flooding. Problematic, but necessary, the release of water to the ocean for flood control will be minimized by certain projects contained in the Comprehensive Everglades Restoration Plan.

The Water Conservation Areas are at normal levels for this time of year.

Phase II modified water restrictions remain in effect and enforcement continues. To date the SFWMD has issued 525 violations to large use permit holders.

The District continues its partnership with the media through the "Just a Drop in the Bucket" outreach campaign urging citizens to stay in a conservation mode through the wet season.

It is important that we remain in high conservation compliance during the wet season as we continue through a serious water shortage and a large deficit in Lake Okeechobee, our backup water supply.

The water shortage news briefings are held every Friday at 11 a.m. in the Storch Conference Room at the SFWMD headquarters at 3301 Gun Club Road in West Palm Beach. **Reporters can be connected to the news briefing teleconference by calling (850) 921-2591.**

For more information:

Randy Smith (561) 682-6197 or (561) 607-3166 pager

Susan Bennett (561) 682-2063 or (561) 790-8481 pager

SFWMD Office of Communications

AnEta Sewell, Director

3301 Gun Club Road

West Palm Beach, FL 33406

www.sfwmd.gov

SOUTH FLORIDA WATER MANAGEMENT DISTRICT**Daily Water Shortage News Briefing Priority Points**
May 31, 2001

At today's South Florida Water Management District water shortage news briefing at District Headquarters in West Palm Beach, staff issued these key points:

- SFWMD meteorologists are forecasting an increase in rainfall activity for this weekend. Computer models show much of the heavier rainfall could be concentrated around Lake Okeechobee and in the basins north of the lake. The northern basins are critical to Lake Okeechobee as they serve as the primary source of recharge for the lake by water inflow. Lake Okeechobee is down 5/100ths of an inch from yesterday at 9.05 feet above sea level. Water levels in the Water Conservation Areas continue to rise with 1, 2 and 3 comfortably above their floor. Very little water is being pumped out of the conservation areas since coastal aquifers were recharged by the rain and are providing adequate water supplies for the Lower East Coast.
- Water pumpage by utilities was reduced 20% District wide in a usage comparison of last week vs. May 2000. District wide comparisons of utilities by county:

Miami-Dade: down 13%
Broward down: 25%
Palm Beach down: 29%
Collier down: 12%

Orange down: 21%
Monroe down: 21%
Lee down: 12%

- However, these numbers represent utility pumping only. These figures do not reflect additional reductions by the utilities as part of the District's 1993 mandatory water conservation program. The reduction percentages are a good indication of how effective the media has been at working with the District to get the conservation message to the public. During Friday's 11 a.m. news briefing, Scott Burns, Director of Water Use Regulation Department, will present consumption rates by county that include breakdowns of all user classes such as agriculture, recreation, diversion and impoundment, utilities and lawn watering.
- It is important that we remain extremely vigilant during the wet season with conservation efforts as we continue through a serious water shortage and a large deficit in Lake Okeechobee, our backup water supply.

The water shortage news briefings are held daily at 11 a.m. in the Storch Conference Room at the SFWMD headquarters at 3301 Gun Club Road in West Palm Beach. Reporters can be connected to the news briefing teleconference by calling (850) 921-2591.

For more information:

Randy Smith (561) 682-6197 or (561) 607-3166 pager

Susan Bennett (561) 682-2063 or (561) 790-8481 pager

SFWMD Office of Communications
AnEta Sewell, Director
3301 Gun Club Road
West Palm Beach, FL 33406
www.sfwmd.gov

SOUTH FLORIDA WATER MANAGEMENT DISTRICT**Daily Water Shortage News Briefing Priority Points***June 01, 2001*

At today's South Florida Water Management District water shortage news briefing at District Headquarters in West Palm Beach, staff issued these key points:

- Thursday's thunderstorms, while small in scale, did provide significant activity for some areas around Lake Okeechobee including the Indian Prairie area. Today's forecast calls for more thunderstorm activity around the lake and north of the lake. District-wide rainfall is expected through Sunday.
- Lake Okeechobee is at 9.02 feet above sea level, down from 9.05 on Thursday. If rainfall amounts are adequate in the Everglades Agricultural Area, rainfall runoff will be captured and used to increase the water supply in Lake Okeechobee. Water quality and flow volumes will be closely monitored during this process.
- Recent comparisons of water usage by county have solely focused on what is being used by the utilities. Today, Scott Burns, Director of Water Use Regulation, presented a breakdown of major user groups including utilities. The figures compare usage in April 2001 vs. April 2000 when no restrictions were in place.
 - ❖ The amount of water pumped through the public water supply is down 11%. Users need to continue to be vigilant with water use both inside and outside their homes.
 - ❖ Diversion and Impoundment, which takes water from the regional water storage and distributes it through the canal system, has provided an 83% cutback. Golf course usage was down 28% from April of 2000.
 - ❖ The Lake Okeechobee Agricultural Service Area is down 60%, saving approximately 47 billion gallons during the month.
 - ❖ Domestic lawn use consumption is down 55%.

It is important that we remain in high conservation compliance during the wet season as we continue through a serious water shortage and a large deficit in Lake Okeechobee, our backup water supply.

The water shortage news briefings are held daily at 11 a.m. in the Storch Conference Room at the SFWMD headquarters at 3301 Gun Club Road in West Palm Beach. Reporters can be connected to the news briefing teleconference by calling (850) 488-4883. (This number is for Monday only)

For more information:

Randy Smith (561) 682-6197 or (561) 607-3166 pager

Susan Bennett (561) 682-2063 or (561) 790-8481 pager

**SFWMD Office of Communications
AnEta Sewell, Director
3301 Gun Club Road
West Palm Beach, FL 33406
www.sfwmd.gov**

SOUTH FLORIDA WATER MANAGEMENT DISTRICT**Weekly Water Shortage News Briefing Priority Points
Friday, June 22, 2001**

At today's South Florida Water Management District water shortage news briefing at District headquarters in West Palm Beach, staff issued these key points:

- Lake Okeechobee water levels remain steady. Today's lake elevation is 9.08 feet above sea level. Lake Okeechobee has hovered around the current level for the past two weeks. No significant rise is expected for the next few weeks. Pumping rainfall runoff into the lake for water supply augmentation is occurring on a regular basis. The pumping has been for short periods and at low volumes, and is expected to continue during the wet season. As part of the Emergency Order from the Florida Department of Environmental Protection allowing the District to pump rainfall runoff into the lake, the District agreed to conduct mitigation activities. District officials announced today a feasibility study of the Fisheating Bay Mud Excavation Project. This project will consist of the removal of approximately 650,000 cubic yards of mud from a 1,500-acre area on the lake's western shore that will help return the area to a top fishing and wildlife haven.
- The Upper Kissimmee Basin, normally a source of rainfall runoff into Lake Okeechobee, is very dry. No major rainfall has been recorded in that area meaning Lake Okeechobee is receiving no water supply from its north side.
- Throughout the District, groundwater supplies are near normal. Canals are at their normal elevations. Rainfall runoff in the coastal canals is being pumped to the ocean during each rainfall event to prevent flooding.
- The Water Conservation Areas are at normal levels for this time of year.
- Phase II modified water restrictions are in effect and enforcement continues. To date the SFWMD has issued 546 violations totaling \$338,100 in penalties.
- The District continues its partnership with the media through the "Just a drop in the Bucket" outreach campaign urging citizens to stay in a conservation mode through the wet season.

It is important that we remain in high conservation compliance during the wet season as we continue through a serious water shortage and a large deficit in Lake Okeechobee, our backup water supply.

The water shortage news briefings are held every Friday at 11 a.m. in the Storch Conference Room at SFWMD headquarters at 3301 Gun Club Road in West Palm Beach. Reporters can be connected to the news briefing teleconference by calling (850) 921-2591.

For more information:

Randy Smith (561) 682-6197 or (561) 607-3166 pager

Susan Bennett (561) 682-2063 or (561) 790-8481 pager

SFWMD Office of Communications

AnEta Sewell, Director

3301 Gun Club Road

West Palm Beach, FL 33406

Appendix 8A-4: Drought-Related Press Release on Lake Okeechobee

[Note: Correspondence from the South Florida Water District's
Media Relations group.]

AnEta Sewell
Office of Communications
Contact: **Randy Smith**
Voice: (561) 682-6197
Pager: (561) 607-3166

June 1, 2001

SFWMD BEGINS BACK-PUMPING TO BOOST CRITICALLY LOW LAKE OKEECHOBEE

Substantial rainfall up to 2 inches recorded yesterday along with local maximum rainfall of 2 inches forecast for today in the Everglades Agricultural Area created the opportunity for the South Florida Water Management District to back-pump the rainfall runoff into Lake Okeechobee to boost its critically low water level of 9.02 feet above sea level and enhance water supply storage. The lake serves as the backup water supply system for most of the South Florida population, agricultural areas and the environment. District Executive Director Frank Finch gave the order this afternoon to start the back-pumping, which began at approximately 4:30 p.m. today.

"For the District to prepare for the next dry season and address the extreme water supply deficit caused by record low rainfall over the past 18 months, moving water from the south for storage in the lake is essential," Finch said. "Continued compliance with modified Phase II restrictions and water conservation even during the rainy summer months are also essential to help build up our water supply. It's going to take some time."

If Lake Okeechobee does not reach approximately 12 feet above sea level by November, a multitude of adverse impacts could result such as extreme residential and commercial water use restrictions, impacts to drinking water wellfields, loss of crops and livestock, irreversible saltwater intrusion damage to coastal wells, and impacts to threatened and endangered species.

Back-pumping is permitted by the Florida Department of Environmental Protection through an Emergency Order issued in April 2001 that allows the District to back-pump for water supply augmentation. The Order is designed to balance the protection of the lake with the need for water supply. The District is required to perform extensive water quality and biological monitoring during back-pumping events. In addition, the District is required to implement several mitigation projects and assist the DEP in a full assessment of any environmental impacts.

- MORE -

More information regarding Lake Okeechobee back-pumping, the water shortage and water use restrictions is available 24 hours a day on the District's Web site at www.sfwmd.gov. Citizens may also contact the Water Shortage Hotline at (800) 662-8876. The special phone line is operational Monday through Friday from 8:30 a.m. to 4:30 p.m.

###

Appendix 8A-5: Drought-Related Press Release on Television Announcement

[Note: Correspondence from the South Florida Water District's
Media Relations group.]



For more information contact:

AnEta Sewell
Office of Communications
Contact: Susan Bennett
Voice: (561) 682-2063
Pager: (561) 790-8481

June 12, 2001

TV METEOROLOGISTS ASKED TO REMIND VIEWERS TO TURN OFF SPRINKLERS DURING RAINY SEASON

Summer Rain Just a Drop in the Bucket

As a public service, the South Florida Water Management District is asking local TV meteorologists to remind viewers to turn off their lawn sprinkler systems after periods of rainfall during the wet season (May/June through October/November). This effort, combined with other water conservation, storage enhancement activities and rainfall accumulation, will help replenish the region's serious water supply shortage caused by record low rainfall over the past 18 months.

Today, Lake Okeechobee, South Florida's backup water supply "bucket," is at a critically low 9.15 feet above sea level, about 4 feet below normal. By November, the "bucket" needs to be approximately 12 feet above sea level to avoid the possibility of imposing even more extreme water restrictions during the next dry season (October/November through May/June). If the "bucket" isn't refilled by November, other possible adverse impacts, such as shrinking drinking water wellfields, loss of crops and livestock, irreversible saltwater intrusion damage to coastal wells and risks to wildlife, may result. Although the wet season is here, it is going to take some time to refill the "bucket" to get us through the next dry season.

May, June, July, August and September are typically the wettest months of the year in South Florida accounting for 50-60 percent of total yearly rainfall. South Florida gets an

- MORE -

South Florida Water Management District, 22416-4680 • 561-686-8800 Florida WATS 1-800-432-2045

Appendix 8A-6: Television and Radio Media Buys/Public Service Announcements

[Note: This appendix is available from the South Florida
Water Management District on CD-ROM.]

Appendix 8A-7: Drought-Related Briefing Paper

[Note: Correspondence from the former South Florida Water Management District's Executive Director to the Florida Department of Environmental Protection.]

MEMORANDUM

TO: Sally Mann and Janet Llewellyn, DEP
FROM: Frank R. Finch, SFWMD Executive Director
SUBJECT: Drought briefing paper and teleconference
DATE: January 10, 2001

VIA E-MAIL

As requested by DEP memoranda dated January 3 and 5, I am providing the attached briefing paper regarding current drought conditions within our District.

We appreciate the interest of Secretary Struhs and the Governor regarding this serious situation and we look forward to participating in the teleconference brainstorming session with DEP and the other WMDs on January 16.

Please contact us if you need any further information or clarification.

RES 16-08**MEMORANDUM**

TO: Mollie Palmer, Assistant Chief-of-Staff, DEP

FROM: Frank Finch, SFWMD Executive Director

DATE: February 16, 2001

SUBJECT: Secretary Struhs' "Drought Management and Coordination" memorandum

In response to the February 13 memorandum requesting additional information on drought management and coordination, the South Florida Water Management District submits the following specifics:

A. Most vulnerable areas/systems and potential consequences; SFWMD actions

BACKGROUND

South Florida is experiencing one of the worst droughts on record -- less than an inch shy of the all-time driest calendar year of 1938. The last drought of this magnitude was in 1961 and since then, the region's population has exploded and, consequently, created greater water use demands.

The SFWMD began tracking the potential for drought conditions in early 2000. In June, staff began developing a Water Supply Contingency Plan. Implementation of the water shortage contingency strategies began in August. In September, the District's Emergency Operations Center was activated at level 2 for a water shortage emergency and a Water Shortage Warning was issued. Mandatory Phase I Water Use Restrictions (*3 -day/week lawn irrigation; 15% overall reduction*) were implemented in November. The Lake Okeechobee Service Area was also placed under Phase III Supply Side Management (*weekly calculation/allotments based on lake water levels and other factors; releases 3-day/week*), reducing deliveries to agricultural water users to less than 50% of seasonal demands. More stringent Phase II Restrictions (*2-day/week lawn irrigation and mandatory pressure reduction by utilities; 30% overall reduction*) were imposed over most of the District in January, 2001.

EMERGENCY MANAGEMENT COORDINATION

Since early December, the SFWMD has been participating in weekly conference calls with the Florida Division of Emergency Management and all of the water management districts to monitor the worsening situation for current and potential impacts to public health and safety. The SFWMD also has met with county and municipal emergency management, briefing them on the existing and projected drought situation. The SFWMD will continue to work with emergency managers at the state and local level as they prepare contingency plans to address identified emergency situations.

MOST CRITICAL AREAS

Lake Okeechobee

On February 16, 2001 Lake Okeechobee is at 10.76 feet NGVD, a record low for the date. The all-time record low level for the lake is 9.79 feet, which occurred in August 1981.

If the current record drought continues, the Lake is projected to fall below 10.0 feet in April 2001. At that stage, water cannot be effectively delivered south by gravity. If the District continues to experience record dry rainfall patterns through the upcoming wet season, the Lake could fall to 8.0 feet in August 2001. In November, the Lake would enter the next dry season at approximately 9.5 feet, 2.5 feet lower than at the beginning of the year 2000 dry season.

As a contingency option for the possibility that the Lake will drop below the point at which water can no longer be effectively delivered south by gravity (10.0 feet), fourteen 100 cfs electric pumps are being constructed and installed to pump water south.

Utilities directly dependent on Lake Okeechobee: Three communities around the Lake have potable water intakes with critical elevations within the range that could be experienced between May and September of 2001. These communities are: Belle Glade (8.5 feet), Clewiston (9.0 feet) and Pahokee (9.35 feet). Staff from the District and DEP have visited all of the utilities withdrawing from the lake to inspect existing facilities and measure critical intake elevations. Contingency plans are under development to address potential problems with these intakes later in the dry season.

Agricultural users directly dependent on Lake Okeechobee: The forward pumps will be key to supply-side management deliveries to the EAA when the Lake is below 10.0 feet. The Lake is the sole source of water for the EAA. However, these pumps can not supply the total peak water demands for the EAA.

The Lake is also the primary water supply for reduced supply side management deliveries to the St. Lucie and Caloosahatchee basins. Deliveries can continue to be made through the locks at stages down to 0 feet NGVD. However, agricultural pumping facilities along the canal may have difficulty withdrawing water at the levels projected to occur with continuing drought conditions through the late dry season and summer of 2001. Intakes may need to be lowered and temporary pumps may also be necessary.

Navigation around the lake has already been impacted with restricted lockages on the Caloosahatchee River and reduced draft throughout the waterway. Further restrictions on lockages may be required to stem the upstream movement of salt water. The recreational fishing industry on the lake is also currently being impacted because low stages prevent access to fishing grounds.

Water Conservation Areas

WCA -2 is projected to reach its minimum stage near the end of February. WCA -1 and WCA-3 are projected to reach their minimum stages late in the dry season. The WCAs, and other natural areas, will face increasing potential for wildfire during this dry season and into the summer. Large-scale muck fires are possible and water supplies to extinguish them will be limited.

Lower East Coast

Under the continuing drought scenario, forward pumping from the lake will also be necessary to maintain groundwater levels in the Biscayne Aquifer, in order to prevent saltwater intrusion. Aquifer levels are currently being maintained by deliveries from the Water Conservation Areas. Under current operational policy, when the minimum WCA stages are reached, any water deliveries to the Lower East Coast must be replaced by an equal volume of water from Lake Okeechobee. Lower East Coast wellfields that are vulnerable to saltwater intrusion could be threatened if the next wet season brings below normal rainfall and the only source of water to maintain stages in the aquifer is forward pumping water from the lake.

Lower West Coast

Salinity levels at the Lee County Olga potable water treatment plant have been maintained with a 2,100 cfs fresh water release from the Lake on two consecutive days, but as the Lake stage continues to recede this will no longer be effective. The District has advised Lee County of the need to acquire and install temporary reverse osmosis facilities as a contingency measure.

Groundwater levels in the Lower West Coast are near record lows. This area is largely dependent upon groundwater and there will be potential for saltwater intrusion in the Lower Tamiami Aquifer and Mid-Hawthorne Aquifer. There will also be significant potential for dry wells, especially in the Sandstone Aquifer, during the late dry season and early wet season.

Indian Prairie / Lake Istokpoga

The Indian Prairie Basin is now receiving a short-term flush of water from the accelerated Lake Istokpoga drawdown. This will bring some immediate relief to an agricultural area that has few alternative water supply options. However, this limited supply will not be sufficient to meet demands through the dry season and into the summer. Agricultural production may be impacted because it may be many months before the lake is refilled, considering the exceptional drought this area is experiencing.

Upper East Coast

The St. Lucie Agricultural Area is primarily dependent on surface water from the C-23, C-24, and C-25 canals for water supply. These canals are 1-2 feet above their minimums, at which point withdrawals of surface water must cease. If the dry conditions persist, levels will drop below the minimum with the next 2 months and remain there until the area experiences local rainfall. Operational protocols will be implemented to maintain stages through reduced withdrawals. The reduction in withdrawals over an extended period of time will impact agricultural production. Alternative sources in the basin include a limited amount of Floridan Aquifer wells which can be used to augment water supply.

Central Florida

Groundwater levels in the Floridan Aquifer near Orlando are also near record low levels for the date. Sinkhole formation is of concern, especially at the beginning of the wet season when rains can increase downward pressure.

LONG-TERM IMPLICATIONS

The implications of a two-year drought are much more severe. If record dry conditions persist, Lake Okeechobee may enter the next dry season significantly lower than this year. In this scenario, all of the potential impacts discussed above will be more extreme and widespread during 2001-2002.

B. Economic and environmental impacts

ECONOMIC-RELATED IMPACTS

The long-term economic impacts of the drought can be divided into what can be considered “nuisance damages,” such as restrictions on hours of lawn watering, and “monetary damages,” where a direct link can be drawn between reductions in water availability and economic activity. Two examples of such economic losses are reduced agricultural crop yields and reduced utilization of golf courses because of degraded playing conditions. Utilities also suffer revenue reductions when they reduce pumpages (*and associated sales of water*), although these costs are partly offset by reduced variable pumpage costs. Rate re-structuring, such as automatically moving to a higher rate during declared water shortages, has the potential, in the long-run, to offset some of these adverse impacts on utilities. The impacts of the water shortage would, however, be borne by consumers. Hopefully, these higher water bills would encourage water conservation.

A prolonged, severe drought likely will result in more severe, multi-year damages, when capital assets, such as loss of citrus trees, or, in less severe cases, reductions in crop yield for several years.

Potential Agricultural Losses: Agricultural losses are directly related to lack of water, which results in reduced crop yield. In prolonged or severe droughts, perennial crops, such as citrus, may be damaged to the extent that yield in subsequent years is reduced, or in extreme cases the plant may be killed. Major irrigated agricultural crops which are potentially susceptible to drought damage include:

- * Sugarcane and vegetables in the Everglades Agricultural Area;
- * Vegetables in the Agricultural Reserve Area in Eastern Palm Beach County;
- * Vegetables and tropical fruit in South Miami-Dade County;
- * Citrus groves, primarily along Lower West Coast and Upper East Coast;
- * Cattle and dairy farms in the Kissimmee basin.

Potential Other Losses: Additional economic-related impacts of a prolonged drought include navigation, boating, and recreational, sport, and commercial fishing. Over 6.5 million visitors per year participate in recreational activities in and around Lake Okeechobee. If water levels get too low, a significant portion of this industry may be affected. A recent study of the Florida freshwater fishing industry indicates that freshwater fishing in Florida has an estimated economic impact of over \$1.029 billion per year and generates over 18,000 jobs. For the 16 counties partially or entirely in the SFWMD, the economic impact of the freshwater fishing industry is estimated at approximately \$95 million, with an estimated 3,100 jobs.

Historic Drought-Related Losses: In general, in past droughts (1970-71, 1980-81, and 1989-90) prudent management and co-operative efforts between the District and private interests have averted major economic losses. The District Water Shortage Plan is structured to avoid cutbacks on efficient irrigators in less severe stages of a drought. In a prolonged, severe drought, some crop losses may be inevitable. For those crops for which South Florida represents a major share of the national or world markets, the adverse effects may be partially offset by an increase in prices due to reduced supplies. Continuing or frequent droughts are expected to encourage irrigators to move to more efficient irrigation systems; those irrigators who cannot or will not convert to more efficient irrigation systems may be forced out of business. However, most large, commercial farms have already switched to efficient irrigation systems. The District water shortage plan is structured to avoid penalizing those who are already utilizing efficient irrigation systems.

ENVIRONMENTAL-RELATED IMPACTS

As the drought progresses, the varied ecosystems of South Florida are being monitored both for current conditions and to attempt to forecast areas of concern. These assessments are being conducted for the Kissimmee River basin, Lake Okeechobee, the coastal estuaries, the Water Conservation Areas, Everglades National Park and Florida Bay. Because the natural system normally experiences wide variation in weather conditions, not all of the observed effects from the drought are negative. However, if the drought develops into a multi-year event, it is anticipated that more and more impacts will be observed.

Lake Okeechobee

Lake Okeechobee is currently experiencing a number of strong positive ecological responses to the period of low lake stages, reflecting recovery of the ecosystem after years of damaging high water levels. Signs of recovery include the following:

9. There is widespread growth of submerged plant beds in regions of the lake where no plants occurred in the late 1990s.
10. There is outward expansion of existing bulrush stands by means of underground runners.
11. There is widespread colonization of exposed lake bottom by new bulrush, spikerush, and other desirable native marsh plants, which appear to be arising from old buried seeds.
12. There is extremely clear water with low phosphorus concentrations (< 40 ppb) in the near-shore regions of the lake.
13. There is continued heavy utilization of the lake by wading birds, ducks, and shore birds.
14. There is ongoing oxidation of organic muck that had accumulated on the lake bottom in the shallow shoreline areas.
15. Compaction and oxidation of organic material that had accumulated in the interior littoral zone has occurred.
16. Large-scale littoral zone fires, set by management agencies and unknown causes, have burned tens of thousands of acres of dense cattail, melaleuca, and torpedograss, and opened up the habitat for potential recolonization by native plants.
17. Low stage has created an opportunity for physical removal of an organic berm along the western lakeshore, a project proposed and under the direction of the Florida Fish and Wildlife Conservation Commission, with assistance provided by the SFWMD.

Some negative ecological consequences may occur if the lake stage falls considerably lower than its present level, but these consequences can be classified as short term or can be reduced in their severity with prompt management actions:

18. Large areas of new submerged plant growth will be exposed, killing the plants. However, studies of the lake's "seed bank" and ecological observations in past droughts, suggest that this effect will only be temporary, and that the submerged community will strongly rebound when moderate lake stages return after the end of the drought.
19. Torpedograss may begin to invade areas that previously were dominated by native plants, when the littoral community begins to recover from the fires. District staff will closely monitor the possible expansion of torpedograss and keep it under control (*to the maximum extent that is practical*) using herbicide. Staff will also monitor the lake area for potential recolonization of melaleuca.
20. The littoral zone will be unavailable as habitat for fish, wading birds, and many other animals that use it under higher lake stage conditions. Based on experiences in past droughts, this is not expected to be a long-term negative effect. In fact staff at the Florida Fish and Wildlife Conservation Commission predict that "the entire ecology of the lake is going to be a lot better off when the lake levels come back up" (*compared to their condition before the period of low stages*).
21. If the District should carry out "water supply backpumping" into the lake at pump stations located at its southern end, there is a potential for adverse impacts on submerged vegetation communities, water quality, and possibly other biota. The shallow bays immediately adjacent to the locations of potential backpumping have displayed strong recovery of their biological communities in the last 9 months and this positive response could be reversed should there be a large influx of nutrient-rich water from the EAA. To prevent or minimize this risk, the District is exploring the option of blocking off access routes between these ecologically sensitive bays and the adjacent "rim canal" (into which water is pumped) using temporary rubber dams. The estimated cost of this strategy is approximately \$0.25 million dollars, not including labor and equipment for installation.

Kissimmee River Basin

Water levels in the Kissimmee Upper Chain-of-Lakes remain 1.5 to nearly 5 feet below regulation schedule. In some lakes, low water levels have the potential to impede navigation.

Extremely low water levels in the Kissimmee River have severely limited navigation through portions of the reconnected river channels. No-flow regimes within reconnected river channels continue to delay ecological recovery within the Kissimmee River restoration project area. Floodplain habitats remain dry, eliminating foraging habitat for wading birds and waterfowl and increasing the risk of wildfire.

Caloosahatchee and St. Lucie Estuaries

Salinity continues to increase in both estuaries. High salinity in the normally brackish regions of the Caloosahatchee continues to stress tape grass beds. The high salinity in both estuaries has been accompanied by increased water clarity and reduced turbidity.

The long-term impacts of drought, or lack of fresh water, on estuarine systems may be summarized from studies of the Apalachicola Bay, FL and other estuaries throughout the world. At the beginning of a drought, when land-derived nutrients are still plentiful, the increased water

clarity and light penetration lead to an increase in estuarine productivity. Thus, for example, a short-term increase in the production of oysters and clams may occur as has been observed in San Francisco Bay and Apalachicola Bay. Over the long-term, the supply of nutrients is exhausted and productivity declines. Multi-year droughts seem to cause a shift from highly productive food webs in the water column to low-productivity communities dominated by bottom dwelling plants and animals.

WATER CONSERVATION AREAS/HOLEYLAND/ROTENBERGER/EVERGLADES NATIONAL PARK

The Everglades ecosystem is adapted to the occasional occurrence of drought conditions. Some elements of the ecosystem will benefit directly from extreme low water. For example, tree islands are expected to benefit unless drought conditions lead to severe, damaging fires on the tree islands. The drought will continue the invasion of woody and exotic species in areas of the WCAs where water management has caused a long-term reduction in water levels and, consequently, changes in the vegetative community.

Muck Fires:

The potential for muck fires is one issue that is being monitored for these areas. The current assessment, conducted from ground and aerial surveys indicates that the Northern end of WCA-1 is completely dry and therefore vulnerable to fire. WCA-2 is especially vulnerable because it has not burned for a number of years. WCA-2 has had some muck fires in the very north end during the early 1980's drought period. Most of western 2A along the L-6 levee is at risk since it is currently dry and has high fuel loads.

Northern WCA-3A (North of I-75) and just south of I-75 has the most history of muck fires within the water conservation areas. In addition, WCA-3B doesn't have any real substantial water inflow mechanism except rainfall and is located over porous limestone and loses water to the underlying aquifer. It has great potential for muck fires under extreme low water level conditions.

Water levels in the western and southern portions of Holeyland are already below ground level. Much of the vegetation in the western area burned last year in a surface fire; thus vegetation densities are somewhat lower than normal. However, there are very high levels of biomass along the southern border. Rotenberger currently holds some water in the southern end while the northern reaches have dried out. The whole tract is likely to be very dry in the near future, but may not have had enough vegetation regrowth since the May 1999 muck fires to support a severe fire this year.

OTHER IMPACTS:

Along with the potential of muck fires, various aspects of the Everglades ecosystem can be expected to be impacted as water levels continue to decline and if the current drought develops into a multi-year event. Anticipated ecological impacts have been assessed using the proposed minimum flows and levels that the District is currently codifying in rule. The definition of significant harm focuses on protection of six key water resource functions of this wetland system that may be impacted if the water levels fall below the proposed minimum flows and level criteria:

-- Snail Kite: Anticipate that refugia habitat for this endangered species will be lost throughout the system.

-- Wading birds: Anticipate that early stages of dry-down will create optimal foraging conditions and lead to initiation of a nesting effort. This year's nesting effort could fail if water levels drop below ground surface in all of WCA2 and WCA3 before the end of April because fish will no longer be available to birds. However, if a total drydown occurs after late May or if surface water in WCA2 and WCA3 never drops completely below ground surface, nesting may not be severely limited. Recovery depends on how quickly populations of prey fish species recover with restoration of natural water levels. It is anticipated that this could take 1-3 years.

--Fish: Fish can survive dry conditions in refugia such as alligator holes, solution holes, or canals. If the drought is so severe as to eliminate all refugia except canals then severe mortality would likely occur. It is anticipated that densities of large fish in canals may exceed sustainable levels. Recovery of fish populations in the marshes following restoration of water levels may take a number of years.

--Alligators: Alligators will migrate into refugia as dry-down continues. Canals provide refugia of last resort. This movement pattern usually doesn't have negative consequences for adults but it results in high mortality for young alligators because of cannibalism by larger individuals. It is also likely that nesting will be impacted because of lack of water.

--Biological filtering: Oxidation of peat soil may occur if groundwater levels are held greater than one foot below soil surface for a period of about a month or more. Muck fires are also possible under these conditions. The effect of both oxidation and fire is to release nutrients bound in the soil. These nutrients will be mobilized as the WCAs rewet, and there will be a marked decline in water quality. The immediate water quality impact will dissipate over the course of the wet season. Recovery from loss of peat soils, either through oxidation or fire, will take years to decades.

--Aquatic refugia: There will be limited effects on aquatic refugia beyond current drought conditions.

An additional concern is related to recent evidence from the United States Geological Survey that in areas of the Everglades subjected to dry-out and fires of 1999, methyl mercury production skyrocketed when these areas were rehydrated. This potential situation will need to be closely monitored both during and after the current drought.

FLORIDA BAY

As the drought persists, Florida Bay may experience hyper-saline conditions. These conditions can lead to the decline of seagrasses and associated biota.

STORMWATER TREATMENT AREAS

The effects of drought on the STAs will vary according to the underlying soil type as well as the composition of vegetation within the STA. Of concern is those STAs constructed on muck soils with submerged aquatic vegetation. If these areas dry out, it is anticipated that there will be a significant release of phosphorus back into the water column upon rewetting. The duration of this release is unknown. However, this could create difficulties with current permit conditions for the operations of these facilities.

Appendix 8A-8: Summary of Drought-Related Media Buys

MARKET – Miami

\$ 220,980.96

Radio- \$ 92,426.00

Anglo Radio

Stations – WFLC, WIOD, WLYF, WMGE, WMXJ, WQAM, WBG, WLVE

731 spots, 7.6 frequency, 55.6 % Reach

African American Radio

Stations- WEDR, WHQT, WPOW, WMBM, WLQY

439 spots, 10.8 frequency, 71.3 Reach

Hispanic Radio

Stations – WAQI, WAMR, WCMQ, WACC, WQBA, WRMA, WRTD

422 spots, paid talk show, 5.6 frequency, 44.9% reach

Television - \$ 78,595.00

Cop- \$ 96.92

Stations : WFLX –Fox, WPBF – ABC, WPEC – CBS, WPTV – NBC,
WTVX – UPN, WSCV-Telemundo, WBZL- WB, WPXM-Pax

Weeks – 5/7, 6/4, 6/18

Strategies: -3 major weeks of TV

-Heavy schedules with 5 stations per week

-Average 120 spots per week not including Psa's

Internet - \$ 15,900

Impressions – 1,050,000

Flight - Ros banners – 120x90 tiles, Sponsorship weather

3 month run

Traffic Sponsorships - \$ 12,870.00

Spots –143 x - Rotating through all stations in the market + bonuses

Outdoor Advertising – 21,099.96

2 Permanent Board and 4 posters

FLORIDA KEYS -**Radio- \$ 2,983.00**

Keys Radio

Cpp – \$ 7.17

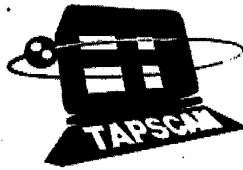
Stations – WEOV, WAIL, WKEY, WFKZ, WWUS

Weeks of 5/7, 5/14, 6/18, 6/25

Internet - \$ 529.43

Impressions – 88,000 visitors /month

Flight - Banners on site



TvSCAN

CAROLINE C. COLLIER - 6/4/01 4:56 PM

Plan Frequency Distribution

Miami-Ft. Lauderdale - FEBMAY Nielsen

Agency: **Media Right Inc.**
 Buyer: **Caroline Collier**
 Client: **South Florida Water Management**

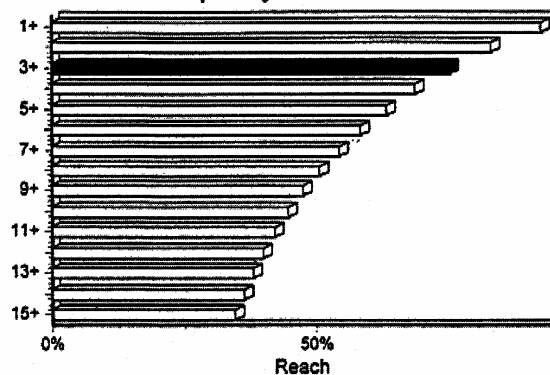
Flight: **Flight 1 04/23/01-07/01/01**
 Lengths: **:10, :15, :30**
 Dayparts: **P2ALES1DCWN**
 Rate Card: **Rate B**

Plan No: **75**
 Company: **MEDIA RIGHT INC.**
 Telephone: **813-281-4421**

Campaign: **2nd qtr 2001**

All Stations	DMA RTG P 25-54	
Description	Estimate	%
Net Schedule Reach (1+)	1,505,680	92.3
Reached 2 or more times	1,350,766	82.8
Reached 3 or more times	1,224,531	75.1
Reached 4 or more times	1,119,506	68.6
Reached 5 or more times	1,030,759	63.2
Reached 6 or more times	954,779	58.5
Reached 7 or more times	888,995	54.5
Reached 8 or more times	831,484	51.0
Reached 9 or more times	780,778	47.9
Reached 10 or more times	735,736	45.1
Reached 11 or more times	695,459	42.6
Reached 12 or more times	659,230	40.4
Reached 13 or more times	626,467	38.4
Reached 14 or more times	596,696	36.6
Reached 15 or more times	569,524	34.9

Frequency Distribution



Station	Total Spots	Total Rch (1+)	Freq 2+	Freq 3+	Freq 4+	Freq 5+	Freq 6+	Freq 7+	Freq 8+	Freq 9+	Freq 10+	Freq 11+	Freq 12+	Freq 13+	Freq 14+	Freq 15+
WBFS	172	26.7%	23.3%	20.7%	18.6%	16.9%	15.5%	14.2%	13.2%	12.2%	11.4%	10.7%	10.1%	9.5%	9.0%	8.5%
WBZL	42	27.1%	20.0%	15.7%	12.8%	10.7%	9.2%	7.9%	6.9%	6.1%	5.5%	4.9%	4.4%	4.0%	3.6%	3.3%
WFOR	70	30.4%	22.9%	18.4%	15.3%	13.0%	11.3%	9.9%	8.8%	7.9%	7.1%	6.5%	5.9%	5.5%	5.0%	4.7%
WPLG	36	23.2%	16.6%	12.8%	10.3%	8.5%	7.2%	6.2%	5.4%	4.7%	4.1%	3.7%	3.3%	2.9%	2.6%	2.4%
WPXM	36	9.1%	7.1%	5.8%	4.8%	4.1%	3.5%	3.1%	2.7%	2.4%	2.1%	1.9%	1.7%	1.5%	1.4%	1.3%
WSVN	74	49.8%	37.8%	30.4%	25.3%	21.5%	18.7%	16.5%	14.7%	13.2%	11.9%	10.9%	9.9%	9.1%	8.5%	7.8%
WTVJ	36	33.4%	21.9%	16.2%	12.6%	10.3%	8.5%	7.3%	6.2%	5.4%	4.8%	4.2%	3.7%	3.3%	3.0%	2.7%
FSN	0	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
WSCV	58	27.5%	21.2%	17.2%	14.4%	12.3%	10.7%	9.4%	8.3%	7.5%	6.8%	6.1%	5.6%	5.1%	4.7%	4.3%
Total	524	92.3%	82.8%	75.1%	68.6%	63.2%	58.5%	54.5%	51.0%	47.9%	45.1%	42.6%	40.4%	38.4%	36.6%	34.9%

Each column reflects the estimated percentage of the target population exposed to the message the indicated number of times or more.
 Prepared with TvSCAN v4.3 Agency: © 2000 TAPSCAN, Inc. (800) 543-7300. TvSCAN, TAPSCAN and the TAPSCAN design are trademarks, service marks and registered marks of TAPSCAN, Inc. Data © Nielsen. Subject to the limitations and restrictions stated in the original report.



*South Florida Water Management District Media Plan**Miami/ Ft. Lauderdale*

Media cost -	\$ 187,757.32
Research Costs -	\$ 1,790.00
Media Right Fees -	\$ 14,357.91
Total Budget -	\$203,905.23

Second Quarter Buy

Miami – Net figures

Television –	\$ 66,805.75
Radio -	\$ 78,562.10
Internet –	\$ 13,515.00
Traffic –	\$ 10,939.50
Outdoor-	\$ 17,934.97

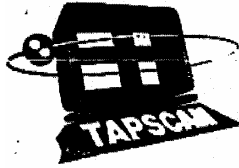
South Florida Water Management District Media Plan

Florida Keys

Media cost -	\$ 2,985.57
Research Costs -	\$ 0
Media Right Fees -	\$ 228.31
Total Budget -	\$3,213.88

Florida Keys

Internet -	\$ 450.02
Radio -	\$ 2,535.55


TvSCAN

CAROLINE C. COLLIER - 6/4/01 4:55 PM

Week by Week Schedule Summary

Miami-Ft. Lauderdale - Nielsen FEBMAY

Agency: Media Right Inc.		Flight: Flight 1											
Buyer: Caroline Collier		Plan No: 75											
Client: South Florida Water Management		Sched Dates: 04/23/01 - 07/01/01		Telephone: 813-281-4421									
Campaign: 2nd qtr 2001		Lengths: :10 :15 :30		Fax Number: 813-281-1185									
Station Program		Rate	Ap	Ap	Ma	Ma	Ma	Jn	Jn	Jn	Jn	DMA P	
Len	Time	Spots	Wks	23	30	7	14	21	28	4	11	18	25
RTG													
WBFS-UPN													
DAY ROTATION		\$90	--	--	--	8	--	--	8	--	8	--	1.0*
:30	Mo-Fr 7:00a-3:00p	24	3										\$90.00
DAY ROTATION		\$0	--	--	--	2	--	--	2	--	2	--	1.0*
:30	Mo-Fr 7:00a-3:00p	6	3										\$0.00
LATE FRINGE ROS		\$450	--	--	--	1	--	--	1	--	1	--	2.4*
:30	Mo-Fr 11:00p-1:00a	3	3										\$187.50
LATE FRINGE ROS		\$0	--	--	--	--	--	--	1	--	--	--	2.4*
:30	Mo-Fr 11:00p-1:00a	1	1										\$0.00
E-Patrol Sponsorships		\$0	--	14	14	14	14	14	14	14	14	14	1.0*
:30	Mo-Su 6:00a-5:00a	126	9										\$0.00
SAT MORN MOV		\$175	--	--	--	2	--	--	2	--	2	--	1.8*
:30	Sat 10:00a-12:00p	6	3										\$97.22
SAT/SUN MOVIE ROS		\$450	--	--	--	2	--	--	2	--	2	--	2.6
:30	Sa-Su 12:00p-6:00p	6	3										\$173.08
WBFS Totals		Spots: 172	\$7,260	--	14	14	29	14	14	30	14	29	14
													192.0
													CPP / CPM: \$37.81
													Reach: 26.7
													Frequency: 7.2
Monthly Breakdown:													
Apr 2001		May 2001	Jun 2001	Jul 2001									
\$0.00		\$2,420.00	\$4,840.00	\$0.00									
WBZL-WBN													
FRIENDS		\$560	--	--	--	1	--	--	1	--	1	--	2.7*
:30	Mo-Fr 11:00p-11:30p	3	3										\$207.41
DREW CAREY		\$150	--	--	--	4	--	--	4	--	4	--	1.4*
:30	Mo-Fr 12:00a-12:30a	12	3										\$107.14
DREW/SUDDENLY SUSAN		\$100	--	--	--	2	--	--	2	--	2	--	1.3*
:30	Mo-Fr 12:00a-1:00a	6	3										\$78.92
LOST WORLD		\$200	--	--	--	1	--	--	1	--	1	--	1.4*
:30	Sat 3:00p-4:00p	3	3										\$142.86
STARGATE SG-1		\$250	--	--	--	1	--	--	1	--	1	--	2.4*
:30	Sat 5:00p-8:00p	3	3										\$104.17
EARTH-FC		\$250	--	--	--	1	--	--	1	--	1	--	2.3*
:30	Sat 6:00p-7:00p	3	3										\$108.70
SEINFELD SA		\$330	--	--	--	1	--	--	1	--	1	--	2.4*
:30	Sat 10:30p-11:00p	3	3										\$137.50
SUN MOVIE ROS		\$230	--	--	--	2	--	--	2	--	2	--	2.9*
:30	Sun 12:00p-6:00p	6	3										\$79.31
Includes Sponsorship Billboard													
FRIENDS WK		\$270	--	--	--	1	--	--	1	--	1	--	2.4
:30	Sun 11:00p-11:30p	3	3										\$112.50
WBZL Totals		Spots: 42	\$9,360	--	--	--	14	--	--	14	--	14	--
													82.8
													CPP / CPM: \$113.04
													Reach: 27.1
													Frequency: 3.1
Monthly Breakdown:													
Apr 2001		May 2001	Jun 2001	Jul 2001									
\$0.00		\$3,120.00	\$6,240.00	\$0.00									
WFOR-CBS													
NWS4THS MRN AM		\$225	--	--	--	2	--	--	2	--	2	--	1.1
:30	Mo-Fr 6:00a-7:00a	6	3										\$204.55

* - Denotes estimated item(s).

Reach and Frequency projections are computed using the Beta-Binomial Extension Formula.

Prepared with TvSCAN v4.3 Agency: © 2000 TAPSCAN, Inc. (800) 843-7300. TvSCAN, TAPSCAN and the TAPSCAN design are trademarks, service marks and registered marks of TAPSCAN, Inc. Data © Nielsen. Subject to the limitations and restrictions stated in the original report.



TvSCAN**Week by Week Schedule Summary**

CAROLINE C. COLLIER - 6/4/01 4:55 PM

Miami-Ft. Lauderdale - Nielsen FEBMAY

Agency: Media Right Inc.	Flight: Flight 1	
B Caroline Collier	Plan No: 75	
Client: South Florida Water Management		Telephone: 813-281-4421
Campaign: 2nd qtr 2001	Sched Dates: 04/23/01 - 07/01/01	Fax Number: 813-281-1185
	Lengths: :10 :15 :30	

Station															DMA P
Program		Rate	Ap	Ap	Ma	Ma	Ma	Ma	Ma	Jn	Jn	Jn	Jn		25-54
Len	Time	Spots	Wks	23	30	7	14	21	28	4	11	18	25		RTG
M-F 6-9A		\$175		--	--	--	2	--	--	2	--	2	--		1.0*
:30	Mo-Fr 6:00a-9:00a	3	6												\$175.00
M-F 6-9A		\$0		--	--	--	--	--	--	3	--	3	--		1.0*
:30	Mo-Fr 6:00a-9:00a	2	6												\$0.00
M-F 9A-12N		\$100		--	--	--	3	--	--	3	--	3	--		1.0*
:30	Mo-Fr 9:00a-12:00p	3	9												\$100.00
M-F 9A-12N		\$0		--	--	--	2	--	--	3	--	3	--		1.0*
:30	Mo-Fr 9:00a-12:00p	3	8												\$0.00
OPRAH WINFREY		\$625		--	--	--	--	--	--	1	--	1	--		2.0*
:30	Mo-Fr 4:00p-5:00p	2	2												\$312.50
CH 4 NEWS-5PM + BB		\$800		--	--	--	2	--	--	2	--	2	--		3.0*
:30	Mo-Fr 5:00p-5:30p	3	6												\$200.00
M-F 5-7P (EN ROS)		\$550		--	--	--	2	--	--	--	--	--	--		2.3
:30	Mo-Fr 5:00p-7:00p	1	2												\$239.13
M-F 5-7P (EN ROS)		\$500		--	--	--	--	--	--	3	--	3	--		2.3
:30	Mo-Fr 5:00p-7:00p	2	6												\$217.39
M-SUN EN ROS		\$0		--	--	--	--	--	--	2	--	2	--		2.1
:30	Mo-Fr 5:00p-7:00p+	2	4												\$0.00
Sa-Su 6:00p-7:00p															
CBS 4 NEWS 5-6A		\$25		--	--	--	5	--	--	5	--	5	--		1.0*
:30	Mo-Fr 5:00a-6:00a	3	15												\$25.00
WFOR Totals	Spots: 70	\$12,825		--	--	--	18	--	--	26	--	26	--		99.4
															CPP / CPM: \$127.01
															Reach: 30.3
															Frequency: 3.3

Monthly Breakdown:				
Apr 2001	May 2001	Jun 2001	Jul 2001	
\$0.00	\$3,525.00	\$9,100.00	\$0.00	

WPLG-ABC															
EYWTNW DYBRK 2		\$300		--	--	2	--	--	--	--	--	--			1.3
:30	Mo-Fr 6:00a-7:00a	1	2												\$230.77
EYWTNW DYBRK 2		\$250		--	--	--	--	--	--	2	--	2	--		1.3
:30	Mo-Fr 6:00a-7:00a	2	4												\$192.31
MAURY POVICH		\$550		--	--	--	--	--	--	2	--	2	--		2.6
:30	Mo-Fr 4:00p-5:00p	2	4												\$211.54
SALLY-RAPHAEL R		\$50		--	--	--	2	--	--	2	--	2	--		1.0*
:30	Mo-Fr 12:30a-1:30a	3	6												\$50.00
WPLG NW SA MRN		\$100		--	--	--	1	--	--	1	--	1	--		1.0
:30	Sat 8:00a-9:00a	3	3												\$100.00
NHL CONFERENCE FINALS		\$500		--	--	--	1	--	--	--	--	--	--		3.0*
:30	Sat 3:00p-6:00p	1	1												\$166.67
AUTO RACING 5/19-20		\$450		--	--	--	1	--	--	1	--	1	--		2.0*
:30	Sa-Su 12:00p-6:00p	3	3												\$225.00
FED EX ST JUDE 6/9-10		\$500		--	--	--	--	--	--	2	--	--	--		4.0*
:30	Sa-Su 3:00p-6:00p	1	2												\$125.00
BUICK CLASSIC 6/23-24		\$500		--	--	--	--	--	--	--	--	2	--		4.0*
:30	Sa-Su 3:00p-6:00p	1	2												\$125.00
WPLG NW SU MRN		\$100		--	--	--	2	--	--	2	--	2	--		1.3
:30	Sun 9:00a-10:30a	3	6												\$76.92
THIS WK ABC/THIS WK SO FL		\$150		--	--	--	1	--	--	1	--	1	--		1.6
:30	Sun 10:30a-12:00p	3	3												\$93.75

* Denotes estimated item(s).

Reach and Frequency projections are computed using the Beta-Binomial Extension Formula.

Prepared with TvSCAN v4.3 Agency: © 2000 TAPSCAN, Inc. (800) 645-7388. TvSCAN, TAPSCAN and the TAPSCAN design are trademarks, service marks and registered marks of TAPSCAN, Inc. Data © Nielsen. Subject to the limitations and restrictions stated in the original report.



TvSCAN

Week by Week Schedule Summary

CAROLINE C. COLLIER - 6/4/01 4:55 PM

Miami-Ft. Lauderdale - Nielsen FEBMAY

Agency: Media Right Inc.	Flight: Flight 1	
Client: Caroline Collier	Plan No: 75	
Campaign: South Florida Water Management	Sched Dates: 04/23/01 - 07/01/01	Telephone: 813-281-4421
Campaign: 2nd qtr 2001	Lengths: :10 :15 :30	Fax Number: 813-281-1185
Station: WPLG	Rate: \$9,300	DMA P: 25-54
Program: WPLG Totals	Spots: 36	RTG: 64.8
Len: 30	Wks: 10	CPP / CPM: \$143.52
Time: 6:00p-6:30p		Reach: 23.2
		Frequency: 2.8
Monthly Breakdown:		
Apr 2001	May 2001	Jun 2001
\$0.00	\$2,100.00	\$7,200.00
WPXM-PAX		
SPRMKT SWP-PAX	\$75	1.0
:30 Mo-Fr 6:00p-6:30p	12 3	\$75.00
TOUCHED-PAX	\$125	1.0
:30 Mo-Fr 9:00p-10:00p	6 3	\$125.00
NBC6NWS-PAX-LN	\$50	1.0*
:30 Mo-Fr 11:30p-12:00a	12 3	\$50.00
CANDID CMR-PAX	\$50	1.0*
:30 Sun 7:00p-8:00p	6 3	\$50.00
WPXM Totals	Spots: 36	38.0
		CPP / CPM: \$70.83
		Reach: 9.1
		Frequency: 4.0
Monthly Breakdown:		
Apr 2001	May 2001	Jun 2001
\$0.00	\$850.00	\$1,700.00
V-FOX		
AY IN FLORIDA 7-9A	\$450	3.1
:30 Mo-Fr 7:00a-9:00a	6 3	\$145.16
TODAY IN FLORIDA 7-9A BILLBOA	\$0	3.1
:30 Mo-Fr 7:00a-9:00a	6 3	\$0.00
CH7 NWS 6:00PM	\$1,000	3.4
:30 Mo-Fr 6:00p-7:00p	2 1	\$294.12
INSIDE EDITN R	\$100	1.1
:30 Mo-Fr 11:45p-12:15a	6 3	\$90.91
CH7 NWS 10-RPT	\$0	1.0*
:30 Mo-Fr 12:15a-1:15a	6 3	\$0.00
TODAY IN FLORIDA 530-6A	\$75	1.6
:30 Mo-Fr 5:30a-6:00a	9 3	\$48.88
TODAY IN FLORIDA 530-6A BILLB	\$0	1.6
:30 Mo-Fr 5:30a-6:00a	9 3	\$0.00
M-SUN PRIME ROS	\$2,200	5.0
:30 Mo-Su 8:00p-10:00p	1 1	\$440.00
M-SUN PRIME ROS	\$2,000	5.0
:30 Mo-Su 8:00p-10:00p	2 2	\$400.00
TODAY-FL SA 8-10A	\$150	1.9
:30 Sat 8:00a-10:00a	6 3	\$78.95
TODAY-FL SA 8-10A BILLBOARD	\$0	1.9
:30 Sat 8:00a-10:00a	6 3	\$0.00
YOUR BIG BREAK	\$850	4.1
:30 Sat 7:00p-8:00p	3 3	\$207.32
CH7WKND NWS-5P	\$350	2.5
:30 Sa-Su 5:00p-6:00p	6 3	\$140.00
CH7WKND NWS-5P BILLBOARD	\$0	2.5
:30 Sa-Su 5:00p-6:00p	6 3	\$0.00

* - Denotes estimated item(s).

Reach and Frequency projections are computed using the Beta-Binomial Extension Formula.

Prepared with TvSCAN v4.3 Agency. © 2000 TAPSCAN, Inc. (800) 843-7300. TvSCAN, TAPSCAN and the TAPSCAN design are trademarks, service marks and registered marks of TAPSCAN, Inc. Data © Nielsen. Subject to the limitations and restrictions stated in the original report.



TvSCAN

CAROLINE C. COLLIER - 6/4/01 4:55 PM

Week by Week Schedule Summary

Miami-Ft. Lauderdale - Nielsen FEBMA

Agency: Media Right Inc.	Flight: Flight 1	
Account: Caroline Collier	Plan No: 75	
Client: South Florida Water Management	Sched Dates: 04/23/01 - 07/01/01	Telephone: 813-281-4421
Campaign: 2nd qtr 2001	Lengths: :10 :15 :30	Fax Number: 813-281-1185

Station	Program	Rate	Ap	Ap	Ma	Ma	Ma	Ma	Jn	Jn	Jn	Jn	DMA
Len	Time	Spots	Wks	23	30	7	14	21	28	4	11	18	25
WSVN Totals	Spots: 74	\$17,725	--	--	--	26	--	--	24	--	24	--	185
													CPP / CPM: \$107.
													Reach: 45
													Frequency: 3
Monthly Breakdown:													
Apr 2001 May 2001 Jun 2001 Jul 2001													
\$0.00 \$7,375.00 \$10,350.00 \$0.00													

WTVJ-NBC													
TODAY-S FLA		\$300	--	--	2	--	--	2	--	2	--		1
:30 Mo-Fr 6:00a-7:00a	6	3											\$166.1
NBC SOAPS		\$250	--	--	--	--	--	--	--	2	--		1
:30 Mo-Fr 1:00p-3:00p	2	1											\$192.1
EXTRA		\$850	--	--	--	--	--	1	--	1	--		3
:30 Mo-Fr 7:30p-8:00p	2	2											\$274.1
TONITE SHW-NBC		\$600	--	--	1	--	--	1	--	1	--		2
:30 Mo-Fr 11:35p-12:35a	3	3											\$230.1
M-F 5-6a/TODAY IN S FL		\$50	--	--	3	--	--	3	--	3	--		1.1
:30 Mo-Fr 5:00a-6:00a	9	3											\$50.0
TODAYS S.FL SA		\$100	--	--	1	--	--	1	--	1	--		1
:30 Sat 6:00a-7:00a	3	3											\$76.1
TODAYS S.FL SA		\$200	--	--	1	--	--	1	--	1	--		1.1
:30 Sat 9:00a-10:00a	3	3											\$125.0
SAT NITE LIVE		\$900	--	--	1	--	--	1	--	1	--		4
:0 Sat 11:30p-1:00a	3	3											\$200.0
SNL REPEAT		\$125	--	--	1	--	--						1
:30 Sat 1:00a-2:00a	1	1											\$69.4
SNL REPEAT		\$100	--	--	--	--	--	1	--	1	--		1
:30 Sat 1:00a-2:00a	2	2											\$55.1
NBC 6 NWS 6PM/NIGHTLY		\$600	--	--	--	--	--	1	--	1	--		3
:30 Sun 6:00p-7:00p	2	2											\$166.1
WTVJ Totals	Spots: 36	\$11,375	--	--	10	--	--	12	--	14	--		71
													CPP / CPM: \$159.7
													Reach: 33
													Frequency: 2
Monthly Breakdown:													
Apr 2001 May 2001 Jun 2001 Jul 2001													
\$0.00 \$2,675.00 \$8,700.00 \$0.00													

WSCV-TEL													
ESTA MANAN-TEL		\$250	--	1	--	1	1	--	1	--			1.1
:30 Mo-Fr 7:00a-9:00a	4	4											\$250.0
ESTA MANAN-TEL Weather Spons		\$0	--	1	--	1	1	--	1	--			1.1
:10 Mo-Fr 7:00a-9:00a	4	4											\$0.0
NOTICIERO 51		\$200	--	1	--	1	1	--	1	--			1.1
:30 Mo-Fr 11:30a-12:00p	4	4											\$200.0
NOTICIERO 51 -Weather Sponsor		\$0	--	1	--	1	1	--	1	--			1.1
:10 Mo-Fr 11:30a-12:00p	4	4											\$0.0
Court TV		\$300	--	1	--	1	1	--	1	--			1
:30 Mo-Fr 3:00p-4:00p	4	4											\$200.0
PSA ROS		\$0	--	6	--	6	6	--	6	--			1
:15 Mo-Su 6:00a-2:00a	24	4											\$0.0
Will run as bookends													
SAT PRIME MOVIES		\$300	--	2	--	2	2	--	2	--			2.1
:30 Sat 7:00p-11:00p	8	4											\$150.0
SUNDAY ROTATION		\$500	--	2	--	1	2	--	1	--			2
:30 Sun 6:00p-8:00p	6	4											\$192.3

* - Denotes estimated item(s).

Reach and Frequency projections are computed using the Beta-Binomial Extension Formula.

Prepared with TvSCAN v4.3 Agency, © 2000 TAPSCAN, Inc. (800) 543-7300. TvSCAN, TAPSCAN and the TAPSCAN design are trademarks, service marks and registered marks of TAPSCAN, Inc. Data © Nielsen. Subject to the limitations and restrictions stated in the original report.



TvSCAN**Week by Week Schedule Summary**

CAROLINE C. COLLIER - 6/4/01 4:55 PM

Miami-Ft. Lauderdale - Nielsen FEBMAY

Agency: Media Right Inc.	Flight: Flight 1	
Client: Caroline Collier	Plan No: 75	
Client: South Florida Water Management	Telephone: 813-281-4421	
Campaign: 2nd qtr 2001	Sched Dates: 04/23/01 - 07/01/01	Fax Number: 813-281-1185
	Lengths: :10 :15 :30	
Station		DMA P
Program	Rate Ap Ap Ma Ma Ma Ma Jn Jn Jn Jn	25-54
Len Time	Spots Wks 23 30 7 14 21 28 4 11 18 25	RTG
WSCV Totals	Spots: 58 \$8,400 -- -- 15 -- 14 15 -- 14 --	99.2
		CPP / CPM: \$84.68
		Reach: 27.5
		Frequency: 3.6
Monthly Breakdown:		
Apr 2001 May 2001 Jun 2001 Jul 2001		
\$0.00 \$4,200.00 \$4,200.00 \$0.00		
Flight 1 Totals	Spots: 524 \$78,595 -- 14 29 119 28 29 131 28 132 14	810.9
		CPP / CPM: \$96.92
		Reach: 92.2
		Frequency: 8.8
Monthly Breakdown:		
Apr 2001 May 2001 Jun 2001 Jul 2001		
\$0.00 \$26,265.00 \$52,330.00 \$0.00		

Reach and Frequency projections are computed using the Beta-Binomial Extension Formula.
 Prepared with TvSCAN v4.3 Agency. © 2000 TAPSCAN, Inc. (800) 543-7306. TvSCAN, TAPSCAN and the TAPSCAN design are trademarks, service marks and registered marks of TAPSCAN, Inc. Data © Nielsen. Subject to the limitations and restrictions stated in the original report.



Appendix 8A-9: First Research Study on Drought-Related Advertising Campaign (Public Poll)

INTRODUCTION

The South Florida Water Management District (the District) contracted with Jay Rayburn, Ph.D., of the Florida Government Performance Survey Research Center at Florida State University to conduct a poll of residents residing in six of the District's counties: Miami-Dade, Broward, Palm Beach, Monroe, Lee and Collier. The distribution of respondents in each county corresponds to the distribution of residence for that county as it appears in the total population.

The primary purpose of the poll was to ascertain awareness of an advertising campaign currently being run by the District. Other issues covered in the poll include knowledge of water shortage in the counties, opinions and behaviors related to water restrictions, and opinions toward the District.

A total of 420 interviews were conducted during March 2001. The description of the sample appears in **Appendix A**. A sample of this size has an approximate error rate of plus or minus 5 percent at the 95 percent level of confidence. This means that if everyone at least 18 years of age in the six counties were interviewed, there is a 95 percent certainty that the results would lie within plus or minus 5 percent of the sample results.

Interviews were conducted in both English and Spanish. A copy of the English version of the questionnaire appears in **Appendix B**. A copy of the Spanish version of the questionnaire appears in **Appendix C**.

Appendix D displays the distribution of responses for each question. In this appendix, individuals who were not asked a particular question based on the answer to a previous question are identified as "Not Answered." **Appendix E** displays the distribution of responses for each question when those who were not asked a particular question are eliminated. In both appendices, those individuals who said either that they did not know the answer to a particular question or who declined to answer a particular question are identified using the letters "DK." In some instances, those individuals who said they did not know were eliminated from the computations, and the percents of only those who expressed an opinion were reported. All reported results were rounded to the nearest whole percent.

RESULTS

CAMPAIGN AWARENESS

Of those expressing an opinion:

39% said the most important issue facing South Florida was related to water

13% said the second most important issue facing South Florida was related to water

52% said the most or second most important issue was related to water

In the total sample:

86% said they had seen something on television or heard some spot on radio talking about water

Of those who said they had seen or heard something about water:

75% said the message was saying something about the restrictions on irrigating lawns, washing cars, or identified the "Turn it Off" message in the spot

11% mentioned the "Turn it Off" message of the spot

In the total sample:

57% said they recalled the “Turn it Off” message

73% of those who recalled the message said it made them more likely to abide by the restrictions, and 23% said the message had no effect

WATER SHORTAGE ISSUES

In the total sample:

82% thought there was a water shortage in South Florida

Of those who said they thought there was a water shortage:

65% said the shortage problem was very serious

29% said the shortage problem was somewhat serious

55% thought there had been a shortage for less than 6 months

20% thought the shortage had been for 6 months to 1 year

20% thought the shortage had been for 1 year or more

48% thought the shortage was caused by lack of rain

8% thought the shortage was caused by wasteful use

5% thought the shortage was caused by insufficient storage systems

4% thought the shortage was caused by overuse

34% thought the shortage was caused by some combination of the above

85% said they made special efforts to conserve water

85% said it was necessary to conserve water so South Florida would have enough water in the future

Of those who said they made special efforts to conserve water:

32% said the main way they conserved water was to follow restrictions on irrigation

20% said they main was they conserved was to follow restrictions on washing their car

47% named some other method of conservation

39% said they conserved water because it was good policy

34% said they conserved water because there was a shortage

13% said they conserved water because there were mandatory restrictions

5% said they conserved water to save money

9% said South Florida’s water supply was very adequate, 31% said adequate, 28% said somewhat inadequate, and 21% said very inadequate

WATER RESTRICTION ISSUES

In the total sample:

88% thought mandatory water restrictions were necessary to conserve water

62% said they abided by the restrictions all of the time, 28% said most of the time and 7% said just some of the time

26% said their neighbors abided by the restrictions all of the time, 35% said most of the time, and 23% said just some of the time

63% said they had made significant changes in the way they used water since the restrictions had been established

45% said agriculture faced the toughest restrictions on water use, 34% said homeowners, and 6% said businesses

50% said they thought most people abided by the restriction on watering their lawn

87% thought the lawn watering restriction was necessary

36% thought the lawn watering restriction was being properly enforced

When asked if there was any activity that was not currently restricted that should be, 10% named commercial car washing; 7% named golf course irrigation; 2% named pressure washing; 15% named some other activity; and 46% said there was no other activity that should be restricted

OPINIONS CONCERNING THE DISTRICT

In the total sample:

9% named the District as the governmental agency created to protect water resources, 10% named some other agency, and 80% named no agency,

55% said they were familiar with the South Florida Water Management District,

89% said the District should engage in educational efforts to promote water conservation,

1% had called the District's 1-800 number, 2% had visited the web site, 2% had done both, and 94% had done neither.

Of those who said they were familiar with the District:

26% said their opinion was very favorable, 40% said somewhat favorable, 11% said somewhat unfavorable, and 4% said very unfavorable,

22% said the District had done more harm than good in addressing water shortage problems, 48% said the District had helped solve water shortage problems, and 31% expressed no opinion.

CONCLUSIONS

Based on the findings above, the following conclusions are offered.

The campaign seems to be having the desired effect although certainly the awareness of the shortage issue has not fully penetrated the market. When asked unprompted:

52% of the sample named some water shortage issue as either most or second most important issue facing South Florida,

86% said they recalled having heard something about water issues,

75% said the message said something about water restrictions, and

57% said they recalled the "Turn it Off" message in the spots.

Of those who recalled the "Turn it Off" message, 73% said the message made them more likely to abide by the restrictions.

In the total sample, 82% thought there was a water shortage in South Florida.

Of those who said they thought there was a shortage, 94% said the problem was either very serious or somewhat serious, and 85% said they made special efforts to conserve water.

In the total sample:

88% thought mandatory restrictions were necessary to conserve water,

90% said they abided by the restrictions either all or most of the time,

87% thought the lawn watering restriction was necessary, and

63% said they had made significant changes in the way they used water since the restrictions had been established.

In the total sample, 89% said the District should engage in educational efforts to promote water conservation.

Of those who were familiar with the District, 66% said their opinion of the District was either very or somewhat favorable, and 48% said the District had helped solve the water shortage problem.

Although the message seems to have penetrated the market, one word of caution is appropriate. While a significant number of respondents say they have heard the messages and believe the water shortage is a serious problem, a significantly smaller number say they have actually made changes in the way they use water. They also say a much smaller percent of their neighbors follow the restrictions. The District may want to strengthen the restrictions message, emphasizing the consequences for not abiding by the restrictions. Respondents acknowledge the necessity for restrictions, but some question arises as to the extent they are actually following these restrictions.

APPENDIX A**DEMOGRAPHICS**

Age	percentage
18 to 24	8
25 to 34	14
35 to 49	25
50 to 64	23
65 or older	28
Refused to answer	2

Education	percentage
Less than high school diploma	9
High school diploma	30
Some college	19
College degree or more	40
Refused to answer	2

Race	percentage
African-American	11
Asian	<1
Caucasian	55
Hispanic	23
Other	6
Refused to answer	4

Income	Percentage
Less than \$25,000	22
\$25,000 to \$50,000	29
\$50,001 to \$75,000	17
More than \$75,000	17
Refused to answer	15

Gender	Percentage
male	42
female	58

County of residence	Percentage
Miami-Dade	42
Broward	27
Collier	4
Lee	7
Monroe	1
Palm Beach	19

APPENDIX B

SFWMD Ad Effects

March, 2001

Hello, my name is _____. I'm calling from the Communication Research Center in Tallahassee. We are conducting a public opinion poll. This is not a sales call—we're just asking people their opinions about issues important to South Florida. Are you at least 18 years old? (IF NOT, ASK TO SPEAK WITH SOMEONE WHO IS. IF NO-ONE IS AT HOME, FIND OUT WHEN SOMEONE WILL RETURN, NOTE AND CALL BACK. WHEN THE APPROPRIATE PERSON IS ON THE PHONE, READ THE INTRODUCTION AGAIN AND CONTINUE.)

We're conducting a short survey about issues important to South Florida. Your phone number was chosen at random, and anything you say to me will be strictly confidential. Let me assure you again, this is not a sales call. In this survey, I may ask you about things you haven't heard about. It's okay to tell me you don't know about the issue—just say so and we'll move on to the next question.

1. First, in your opinion, what is the most important issue facing South Florida today?
 - 1 named some water issue (shortage, conservation, drought, etc.)
 - 2 named some other issue
 - 9 DK
2. And what is the second most important issue facing South Florida today?
 - 1 named some water issue (shortage, conservation, drought, etc.)
 - 2 named some other issue
 - 9 DK
3. In the past few weeks, have you seen any public service announcements or advertisements on radio or television talking about water?
 - 1 yes (ASK 4)
 - 2 no (SKIP TO 6)
 - 9 DK (SKIP TO 6)
4. What was the message saying about water?
 - 1 restrictions on irrigating/washing cars/"Turn it OFF"
 - 2 remember seeing/hearing something but not exactly sure what it was
 - 9 DK
5. Do you recall the tag line or main message on the spots? (IF YES, ASK WHAT IT WAS.)
 - 1 yes, "Turn it Off"
 - 2 no
 - 3 DK
6. In your opinion, is there a water shortage in South Florida now?
 - 1 yes (ASK 7)
 - 2 no (SKIP TO 10)

9 DK (SKIP TO 11)

7. How serious do you think the water shortage problem is for your community? Would you say very serious, somewhat serious, not very serious, or not at all serious?

- 1 very serious
- 2 somewhat serious
- 3 not very serious
- 4 not at all serious
- 9 DK

8. How long would you say the water shortage has been going on?

- 1 less than 6 months
- 2 6 months to 1 year
- 3 more than 1 year but less than 2
- 4 more than 2 years
- 9 DK

9. What would you say is the main cause of the water shortage: overuse of water, lack of rainfall, insufficient systems for storing excess water, or wasteful water use?

- 1 overuse (SKIP TO 11)
- 2 lack of rain (SKIP TO 11)
- 3 insufficient storage system (SKIP TO 11)
- 4 wasteful use (SKIP TO 11)
- 5 some combination of these (SKIP TO 11)
- 9 DK (SKIP TO 11)

10. Why do you think there is no water shortage?

- 1 it has been raining enough
- 2 there is enough water stored
- 3 some other reason
- 9 DK

11. The main message in the announcements is about mandatory restrictions on watering your lawn and washing your car, and unnecessary use of water. The tag line in the spots is “Turn it Off.” Do you recall hearing these messages?

- 1 yes (ASK 12)
- 2 no (SKIP TO 13)
- 3 DK (SKIP TO 13)

12. Did these ads make you more likely or less likely to abide by the water restrictions, or did they not affect your attitude at all?

- 1 more likely
 - 2 less likely
 - 3 had no effect
 - 9 DK
13. Do you make any special efforts to conserve water?
- 1 yes (ASK 14)
 - 2 no (SKIP TO 16)
 - 9 DK (SKIP TO 16)
14. What is the primary or main way you conserve water?
- 1 follow restrictions on irrigation
 - 2 follow restrictions on washing my car
 - 3 named some other conservation measure
 - 9 DK
15. Why do you act to conserve water?
- 1 to save money
 - 2 because we have a shortage
 - 3 because of mandatory restrictions
 - 4 because it's just good policy/the thing to do
 - 5 some other reason
 - 9 DK
16. Do you think it is necessary for people to conserve water to ensure that South Florida has enough water in the future, or do you think there are enough high quality sources of water to meet future needs?
- 1 necessary to conserve
 - 2 enough sources available
 - 9 DK
17. Now think about restrictions on water use. Do you think mandatory water restrictions are necessary to conserve water?
- 1 necessary
 - 2 unnecessary
 - 9 DK
18. Generally, do you abide by water restrictions all of the time, most of the time, or just some of the time?
- 1 all of the time
 - 2 most of the time
 - 3 some of the time

4 DK

19. From what you have seen, do you think your neighbors generally abide by the restrictions all of the time, most of the time, or just some of the time?

1 all of the time

2 most of the time

3 some of the time

4 DK

20. Since restrictions have been established for South Florida, would you say you have made significant changes in the way you use water?

1 yes

2 no

9 DK

21. From what you know, who faces the toughest restrictions on their water use: agriculture, businesses, or residential homeowners?

1 agriculture

2 business

3 homeowners

9 DK

22. One of the current restrictions has to do with when you can water your lawn. Currently watering is permitted between 4 AM and 8 AM only two days a week. Do you think most people abide by that restriction?

1 yes

2 no

9 DK

23. Do you think this restriction is necessary or unnecessary?

1 necessary

2 unnecessary

9 DK

24. Do you think this restriction is being properly enforced?

1 yes

2 no

9 DK

25. Is there any water use activity that isn't currently restricted but, in your opinion, should be restricted? (IF YES, WHAT?)

1 no

2 pressure washing

3 commercial car washing

- 4 golf course irrigation
 - 5 other
 - 9 DK
26. Are you aware of any government agencies that have been created to protect water resources?
(IF YES, ASK THE NAME.)
- 1 named South Florida Water Management District
 - 2 named some other agency
 - 9 DK
27. Are you familiar with the South Florida Water Management District?
- 1 yes (ASK 28)
 - 2 no (SKIP TO 30)
 - 9 DK (SKIP TO 30)
28. Based on what you know about the water management district, would you say your opinion toward the district is very favorable, somewhat favorable, somewhat unfavorable, or very unfavorable?
- 1 very favorable
 - 2 somewhat favorable
 - 3 somewhat unfavorable
 - 4 very unfavorable
 - 9 DK
29. Some people say the South Florida Water Management District has done more harm than good in its work on the water shortage problem; others say the district has made a positive difference in helping to solve the water shortage problem. Which of these two opinions is closer to your point of view?
- 1 done more harm than good
 - 2 helped solve water shortage problem
 - 9 DK
30. Do you think South Florida's water supply is very adequate, somewhat adequate, somewhat inadequate, or very inadequate to handle the growth in South Florida?
- 1 very adequate
 - 2 somewhat adequate
 - 3 somewhat inadequate
 - 4 very inadequate
 - 9 DK
31. From time to time, the water management district engages in educational efforts to promote water conservation. Do you think these efforts should or should not be continued in the future?
- 1 should be continued

- 2 should not be continued
 - 9 DK
32. In the past, have you ever called the water management district's 1-800 number or visited the web site for more information about water issues?
- 1 called 1-800
 - 2 visited web site
 - 3 both
 - 4 done neither
 - 9 DK
33. For statistical purposes only, in which of the following categories does your age fall: 18 to 24, 25 to 34, 35 to 49, 50 to 64, or 65 or older?
- 1 18-24
 - 2 25 to 34
 - 3 35 to 49
 - 4 50 to 64
 - 5 65 or older
 - 9 DK
34. What is the last year you completed in school?
- 1 less than a high school degree
 - 2 high school graduate
 - 3 some college
 - 4 college graduate or more
 - 9 DK
35. What is your race or national origin?
- 1 African American
 - 2 Asian
 - 3 Caucasian
 - 4 Hispanic
 - 5 other
 - 9 DK
36. Finally, I am going to read you a list of categories that describes household income. Please just say the word "stop" when I read the category that best describes your total household income for 2000...
- 1 less than \$25,000
 - 2 \$25,000 to 50,000

3 \$50,000 to 75,000, or

4 more than \$75,000

9 DK

This concludes our survey. Thank you for your time and answers.

37. GENDER (CODE BUT DO NOT ASK)

1 male

3 female

38. COUNTY

1 Dade

4 Lee

2 Broward

5 Monroe

3 Collier

6 Palm Beach

APPENDIX C

Hola, me llamo _____. Estoy llamando del Centro de Investigaciones de Comunicaciones en Tallahassee. Estamos conduciendo una encuesta de opinión pública sobre los asuntos importantes en el sur de la Florida. ¿Tiene usted al menos 18 años de edad? (SI NO, PIDA HABLAR CON ALGUIEN QUE TENGA 18 AÑOS. SI NO HAY NADIE EN LA CASA, AVERIGÜE CUANDO ALGUIEN ESTARÁ DE REGRESO, APUNTE LA HORA Y DEVUELVA LA LLAMADA. CUANDO LA PERSONA APROPIADA ESTÉ AL TELÉFONO, LEA LA INTRODUCCIÓN DE NUEVO Y CONTINUE)

Estamos conduciendo una encuesta corta sobre los asuntos importantes en el sur de la Florida. Su número fue seleccionado al azar, y cualquier cosa que diga será sumamente confidencial. Déjeme asegurarle otra vez, ésta no es una llamada de ventas. En esta encuesta, puede que le pregunte sobre algunas cosas de las cuales nunca haya oído antes. Está bien que usted me diga si no conoce nada sobre el asunto- sólo indícamelo y seguiré con la próxima pregunta.

¿Primero, es su opinión cuál es uno de los asuntos más importantes con el cual se enfrenta el sur de la Florida hoy en día?

1 mencionó algún asunto relacionado con el agua (escasez, conservación, sequía, etc.)

2 mencionó algún otro asunto

9 No sabe

¿Y cuál es el segundo asunto más importante con el cual se enfrenta el sur de la Florida hoy en día?

1 mencionó algún asunto relacionado con el agua (escasez, conservación, sequía, etc.)

2 mencionó algún otro asunto

9 No sabe

En las últimas semanas, ¿ha visto / escuchado usted algún anuncio de servicio público o propaganda por la radio o la televisión hablando sobre el agua?

1 sí (pregunte 4)

2 no (SALTE a 6)

9 N/S (SALTE a 6)

¿Qué decía el mensaje sobre el agua?

1 restricciones en irrigación / lavado de carros/ APÁGUELO

2 recuerda haber visto / escuchado, pero no está seguro/a de lo qué fue

9 N/S

¿Recuerda la frase clave o el mensaje principal? (Si DICE SÍ, PREGUNTE CUÁL ERA)

1 Sí, “APÁGUELO” (TURN IT OFF)

2 no

9 N/S

¿En su opinión, existe una escasez de agua en el sur de la Florida ahora?

1 Sí (PREGUNTE 7)

2 no (SALTE A 10)

9 N/S (SALTE A 11)

¿Cuán serio cree usted que es el problema de la escasez de agua en su comunidad? ¿Diría usted que es muy serio, un poco serio, no muy serio, o no es nada de serio?

1 muy serio

2 un poco serio

3 no muy serio

4 no es nada de serio

9 N/S

¿Hace cuánto diría usted que existe la escasez de agua?

1 menos de 6 meses

2 6 meses a 1 año

3 más de 1 año, pero menos de 2

4 más de 2 años

9 N/S

¿Cuál diría usted que es la causa principal de la escasez de agua: sobre uso del agua, falta de lluvia, no hay suficientes sistemas para almacenar el agua, o desperdicio de agua?

- 1 sobre uso (SALTE a 11)
- 2 falta de lluvia (SALTE a 11)
- 3 no hay suficientes sistemas de almacenaje (SALTE a 11)
- 4 desperdicio de agua (SALTE a 11)
- 5 alguna combinación de éstos (SALTE a 11)
- 9 N/S (SALTE a 11)

¿Por qué cree usted que no existe una escasez de agua?

- 1 ha habido suficiente lluvia
- 2 hay suficiente agua almacenada
- 3 alguna otra razón
- 9 N/S

El mensaje principal en los anuncios es sobre las restricciones mandatorias acerca de regar la césped y lavar el auto, y los usos innecesarios del agua. La frase principal es “Apáguelo” (TURN IT OFF). ¿Recuerda usted haber escuchado estos mensajes?

- 1 Sí (PREGUNTE 12)
- 2 NO (SALTE a 13)
- 9 N/S (SALTE a 13)

¿Acaso estos anuncios le hicieron más o menos obedecer o más o menos no obedecer estas restricciones de agua, o acaso no le afectaron su posición en nada?

- 1 más o menos si
- 2 más o menos no
- 3 no tuvo efecto
- 9 N/S

¿Toma usted alguna medida para conservar el agua?

1 Sí (PREGUNTE 14)

2 No (SALTE a 16)

9 N/S

¿Cuál es la medida principal que toma usted para conservar el agua?

1 seguir las restricciones de irrigación

2 seguir las restricciones de lavar mi auto

3 nombró alguna otra medida para conservar el agua

9 N/S

¿Por qué conserva usted el agua?

1 para ahorrar el dinero

2 porque tenemos una escasez

3 a causa de las restricciones mandatorias

4 alguna otra razón

9 N/S

¿Cree usted que sea necesario conservar el agua para asegurar de que el sur de la Florida tenga agua en el futuro, o cree que hay recursos suficientes de alta calidad para satisfacer las necesidades en el futuro?

1 necesario conservar

2 recursos suficientes

9 N/S

Ahora piense usted en las restricciones del uso del agua. ¿Cree usted que sean necesarias las restricciones mandatorias para conservar el agua?

1 necesarias

2 innecesarias

9 N/S

¿Por lo general, obedece usted a las restricciones todo el tiempo, casi siempre, o sólo a veces?

1 todo el tiempo

2 casi siempre

3 sólo a veces

9 N/S

¿De lo que usted se ha fijado, cree usted que por lo general sus vecinos obedecen a las restricciones todo el tiempo, casi siempre, o sólo a veces?

1 todo el tiempo

2 casi siempre

3 sólo a veces

9 N/S

¿Desde que se han establecido las restricciones en el sur de la Florida, diría usted que han causado cambios significativos en la manera que usted utiliza el agua?

1 Sí

2 no

9 N/S

De acuerdo a lo que usted sabe, ¿quién se enfrenta a las restricciones más rígidas en su uso de agua: la agricultura, los negocios, o los dueños de propiedades residenciales?

1 la agricultura

2 los negocios

3 los dueños de propiedades residenciales

9 N/S

Una de las restricciones tiene que ver con cuándo usted puede regar su césped. Actualmente el regar se permite entre 4am y 8am, solamente 2 veces a la semana. ¿Cree usted que la mayoría de la gente obedece esta restricción?

1 Sí

2 no

9 N/S

¿Cree usted que esta restricción es necesaria o innecesaria?

1 necesaria

2 innecesaria

3 N/S

¿Cree usted que esta restricción es adecuadamente reesforzada?

1 Sí

2 No

9. N/S

¿Existe algún uso de agua que no sea restringido actualmente, pero que en su opinión, debe de serlo? (Si sí, ¿qué?)

1 no

2 el lavado a presión

3 el lavado comercial de autos

4 la irrigación en los campos de golf

5 otro

9 N/S

¿Está usted consciente de alguna agencia gubernamental que haya sido creada para proteger nuestros recursos de agua? (si Sí, PREGUNTE EL NOMBRE)

1 mencionó El Distrito de Manejo de Agua del Sur de la Florida (South Florida Water Management District)

2 mencionó otra agencia

9 N/S

¿Está usted orientado/a con el Distrito de manejo de Agua del Sur de la Florida (South Florida Water Management District)?

1 Sí (PREGUNTE 28)

2 no (SALTE a 30)

9 N/S (SALTE a 30)

De acuerdo con lo que usted conoce acerca del distrito de manejo de agua, ¿diría usted que su opinión hacia el distrito es muy favorable, un poco favorable, un poco no favorable, o nada de favorable?

1 muy favorable

2 un poco favorable

3 un poco no favorable

4 nada de favorable

Algunos dicen que el Distrito de manejo de Agua del Sur de la Florida ha causado más daño de lo que ha hecho bien en su labor sobre el problema de la escasez del agua; otros dicen que ha tenido una influencia positiva ayudando a resolver el problema de la escasez de agua. ¿Cuáles de las opiniones mencionadas se aproxima más a su punto de vista?

1 ha causado más daño de lo que ha hecho bien

2 ha ayudado resolver el problema de la escasez de agua

9 N/S

¿Cree usted que el suministro de agua en el sur de la Florida es muy adecuado, un poco adecuado, un poco inadecuado, o muy inadecuado para soportar el crecimiento en el sur de la Florida?

1 muy adecuado

2 un poco adecuado

3 un poco inadecuado

4 muy inadecuado

9 N/S

De vez en cuando, el distrito de manejo del agua se ocupa de esfuerzos educacionales para promover la conservación del agua. ¿Cree usted que se debe o no se debe continuar estos esfuerzos en el futuro?

1 se debe continuar

2 no se debe continuar

9 N/S

¿En algún momento en el pasado, ha usted llamado al número 1-800 o ha usted visitado el sitio web para más información acerca de los asuntos del agua?

1 llamó al número 1-800

2 visitó el sitio web

3 ambos

4 no ha hecho ninguno

9 N/S

¿Para propósitos de estadística solamente, bajo cuál categoría cae su edad: 18-24, 25-34, 35-49, 50-64, 65 o más?

1 25-34

2 18-24

3 35-49

4 50-64

5 65 o más

9. n/s

¿Hasta dónde llegó usted en sus estudios?

1 menos de un diploma de secundaria

2 completó la secundaria

3 un poco de universidad

4 graduado de la universidad, o más

9 N/S

¿Qué considera usted como su nacionalidad?

1 africano americano

2 oriental

3 blanco

4 hispano

5 otro

9 N/S

Finalmente, le voy a leer una lista de categorías que describe sus ingresos anuales. Por favor, dígame que pare cuando yo lea la categoría que mejor describe sus ingresos anuales para el año 2000:

1 menos de \$25,000

2 \$25,00-\$50,000

3 \$50,000-\$75,000

4 más de 75,000

9 no sabe

Aquí concluye nuestra encuesta. Muchísimas gracias por su tiempo y sus respuestas.

GÉNERO (ENTRE EL CÓDIGO PERO NO PREGUNTE)

(1) MASCULINO (3) FEMENINO (9) NO PUEDE DETERMINAR

CONDADO

1 Dade	4 Lee
2 Broward	5 Monroe
3 Collier	6 Palm Beach

APPENDIX D

	Count	Percent
1. First, in your opinion, what is the most important issue facing South Florida today?		
1. named some water issue (shortage, conservation, drought, etc.)	144	34.29%,
2. named some other issue	226	53.81 %
9. DK	50	11.90 %
Total Responses	420	100 %
2. And what is the second most important issue facing South Florida today?		
1 named some water issue (shortage, conservation, drought, etc.)	41	9.76 %
2 named some other issue	273	65.00 %
9 DK	106	25.24 %
Total Responses	420	100 %
3. In the past few weeks, have you seen any public service announcements or advertisements on radio or television talking about water?		
1 yes (ASK 4)	360	85.71 %
2 no (SKIP TO 6)	58	13.81 %
9 DK (SKIP TO 6)	2	0.48 %
Total Responses	420	100 %

4. What was the message saying about water?

(Not Answered)	60	14.29 %
1 restrictions on irrigating/washing cars/"Turn it OFF"	261	62.14 %
2 remember seeing/hearing something but not exactly sure what it was	88	20.95 %
9 DK	11	2.62 %
Total Responses	420	100 %

5. Do you recall the tag line or main message on the spots? (If YES, ASK WHAT IT WAS.)

(Not Answered)	60	14.29 %
1 yes, "Turn it Off"	38	9.05 %
2 no	303	72.14 %
9 DK	19	4.52 %
Total Responses	420	100 %

6. In your opinion, is there a water shortage in South Florida now?

1 yes (ASK 7)	343	81.67 %
2 no (SKIP TO 10)	42	10.00 %
9 DK (SKIP TO 11)	35	8.33 %
Total Responses	420	100

7. How serious do you think the water shortage problem is for your community? Would you say very serious, somewhat serious, not very serious, or not at all serious?

(Not Answered)	77	18.33 %
1 very serious	224	53.33 %
2 somewhat serious	98	23.33 %
3 not very serious	12	2.86 %
4 not at all serious	1	0.24 %
9 DK	8	1.90 %
Total Responses	420	100 %

8. How long would you say the water shortage has been going on?

(Not Answered)	77	18.33 %
1 less than 6 months	189	45.00 %
2 6 months to 1 year	69	16.43 %
3 more than 1 year but less than 2 years	24	5.71 %
4 more than 2 years	43	10.24 %
9 DK	18	4.29 %
Total Responses	420	100 %

9. What would you say is the main cause of the water shortage: overuse of water, lack of rainfall, insufficient systems for storing excess water, or wasteful water use?

(Not Answered)	77	18.33 %
1 overuse (SKIP TO 11)	14	3.33 %
2 lack of rain (SKIP TO 11)	163	38.81 %
3 insufficient storage systems (SKIP TO 11)	17	4.05 %
4 wasteful use (SKIP TO 11)	28	6.67 %
5 some combination of these (SKIP TO 11)	117	27.86 %
9 DK (SKIP TO 11)	4	0.95 %
Total Responses	420	100 %

10. Why do you think there is no water shortage?

(Not Answered)	378	90.00 %
1 it has been raining enough	3	0.71 %
2 there is enough water stored	7	1.67 %
3 some other reason	24	5.71 %
9 DK	8	1.90 %
Total Responses	420	100 %

11. The main message in the announcements is about mandatory restrictions on watering your lawn and washing your car, and unnecessary use of water. The tag line in the spots is "Turn it Off." Do you recall hearing these messages?

1 yes (ASK 12)	238	56.67 %
2 no (SKIP TO 13)	177	42.14 %
9 DK (SKIP TO 13)	5	1.19 %
Total Responses	420	100 %

12. Did these ads make you more likely or less likely to abide by the water restrictions, or did they not affect your attitude at all?

(Not Answered)	182	43.33 %
1 more likely	174	41.43 %
2 less likely	7	1.67 %
3 had no effect	54	12.86 %
9 DK	3	0.71 %
Total Responses	420	100 %

13. Do you make any special efforts to conserve water?

1 yes (ASK 14)	357	85.00 %
2 no (SKIP TO 16)	61	14.52 %
9 DK (SKIP TO 16)	2	0.48 %
Total Responses	420	100 %

14. What is the primary or main way you conserve water?

(Not Answered)	63	15.00 %
1 follow restrictions on irrigation	116	27.62 %
2 follow restrictions on washing my car	71	16.90 %
3 named some other conservation measure	168	40.00 %
9 DK	2	0.48 %

Total Responses	420	100 %
------------------------	------------	--------------

15. Why do you act to conserve water?

(Not Answered)	63	15.00 %
1 to save money	18	4.29 %
2 because we have a shortage	123	29.29 %
3 because of mandatory restrictions	46	10.95 %
4 because it's just good policy/the thing to do	139	33.10 %
5 some other reason	28	6.67 %
9 DK	3	0.71 %

Total Responses	420	100 %
------------------------	------------	--------------

16. Do you think it is necessary for people to conserve water to ensure that South Florida has enough water in the future, or do you think there are enough high quality sources of water to meet future needs?

1 necessary to conserve	359	85.48 %
2 enough sources available	35	8.33 %
9 DK	26	6.19 %

Total Responses	420	100 %
------------------------	------------	--------------

17. Now think about restrictions on water use. Do you think mandatory water restrictions are necessary to conserve water?

1 necessary	370	88.10 %
2 unnecessary	35	8.33 %
9 DK	15	3.57 %

Total Responses	420	100 %
------------------------	------------	--------------

18. Generally, do you abide by water restrictions all of the time, most of the time, or just some of the time?

1 all of the time	261	62.14 %
2 most of the time	119	28.33 %
3 some of the time	28	6.67 %
9 DK	12	2.86 %
Total Responses	420	100 %

19. From what you have seen, do you think your neighbors generally abide by the restrictions all of the time, most of the time, or just some of the time?

1 all of the time	110	26.19 %
2 most of the time	147	35.00 %
3 some of the time	96	22.86 %
9 DK	67	15.95 %
Total Responses	420	100 %

20. Since restrictions have been established for South Florida, would you say you have made significant changes in the way you use water?

1 yes	265	63.10 %
2 no	140	33.33 %
9 DK	15	3.57 %
Total Responses	420	100 %

21. From what you know, who faces the toughest restrictions on their water use: agriculture, businesses, or residential homeowners?

1 agriculture	191	45.48 %
2 businesses	24	5.71 %
3 homeowners	142	33.81 %
9 DK	63	15.00 %
Total Responses	420	100 %

22. One of the current restrictions has to do with when you can water your lawn. Currently, watering is permitted between 4 AM and 8 AM only, two days a week. Do you think most people abide by that restriction?

1 yes	209	49.76 %
2 no	151	35.95 %
9 DK	60	14.29 %
Total Responses	420	100 %

23. Do you think this restriction is necessary or unnecessary?

1 necessary	367	87.38 %
2 unnecessary	29	6.90 %
9 DK	24	5.71 %
Total Responses	420	100 %

24. Do you think this restriction is being properly enforced?

1 yes	153	36.43 %
2 no	159	37.86 %
9 DK	108	25.71 %
Total Responses	420	100 %

25. Is there any water use activity that isn't currently restricted but, in your opinion, should be restricted? (IF YES, WHAT?)

1 no	195	46.43 %
2 pressure washing	7	1.67 %
3 commercial car washing	40	9.52 %
4 golf course irrigation	29	6.90 %
5 other	63	15.00 %
9 DK	86	20.48 %
Total Responses	420	100 %

26. Are you aware of any government agencies that have been created to protect water resources? (IF YES, ASK THE NAME.)

1 named South Florida Water Management District	36	8.57 %
2 named some other agency	44	10.48 %
3 no	295	70.24 %
9 DK	45	10.71 %
Total Responses	420	100 %

27. Are you familiar with the South Florida Water Management District?

1 yes (ASK 28)	231	55.00 %
2 no (SKIP TO 30)	185	44.05 %
9 DK (SKIP TO 30)	4	0.95 %
Total Responses	420	100 %

28. Based on what you know about the water management district, would you say your opinion toward the district is very favorable, somewhat favorable, somewhat unfavorable, or very unfavorable?

(Not Answered)	189	45.00 %
1 very favorable	61	14.52 %
2 somewhat favorable	93	22.14 %
3 somewhat unfavorable	24	5.71 %
4 very unfavorable	9	2.14 %
9 DK	44	10.48 %
Total Responses	420	100 %

29. Some people say the South Florida Water Management District has done more harm than good in its work on the water shortage problem; others say the district has made a positive difference in helping to solve the water shortage problem. Which of...

(Not Answered)	189	45.00 %
1 done more harm than good	50	11.90 %
2 helped solve water shortage problem	110	26.19 %
9 DK	71	16.90 %
Total Responses	420	100 %

30. Do you think South Florida's water supply is very adequate, somewhat adequate, somewhat inadequate, or very inadequate to handle the growth in South Florida?

1 very adequate	37	8.81 %
2 somewhat adequate	132	31.43 %
3 somewhat inadequate	119	28.33 %
4 very inadequate	87	20.71 %
9 DK	45	10.71 %
Total Responses	420	100 %

31. From time to time, the water management district engages in educational efforts to promote water conservation. Do you think these efforts should or should not be continued in the future?

1 should be continued	373	88.81 %
2 should not be continued	25	5.95 %
9 DK	22	5.24 %
Total Responses	420	100 %

32. In the past, have you ever called the water management district's 1-800 number or visited the web site for more information about water issues?

1 called 1-800	6	1.43 %
2 visited web site	8	1.90 %
3 both	9	2.14 %
4 done neither	383	91.19 %
9 DK	14	3.33 %
Total Responses	420	100 %

33. For statistical purposes only, in which of the following categories does your age fall: 18 to 24; 25 to 34; 35 to 49; 50 to 64; or 65 or older?

1 18 to 24	35	8.33 %
2 25 to 34	59	14.05 %
3 35 to 49	103	24.52 %
4 50 to 64	98	23.33 %
5 65 or older	117	27.86 %
9 DK	8	1.90 %
Total Responses	420	100 %

34. What is the last year you completed in school?

1 less than a high school degree	36	8.57 %
2 high school graduate	126	30.00 %
3 some college	79	18.81 %
4 college graduate or more	170	40.48 %
9 DK	9	2.14 %
Total Responses	420	100 %

35. What is your race or national origin?

1 African American	48	11.43 %
2 Asian	2	0.48 %
3 Caucasian	229	54.52 %
4 Hispanic	97	23.10 %
5 other	26	6.19 %
9 DK/ refused	18	4.29 %
Total Responses	420	100 %

36. Finally, I am going to read you a list of categories that describes household income. Please just say the word "stop" when I read the category that best describes your total household income for 2000...

1 less than \$25,000	92	21.90 %
2 \$25,000 to 50,000	120	28.57 %
3 \$50,000 to 75,000, or	73	17.38 %
4 more than \$75,000	71	16.90 %
9 DK	64	15.24 %
Total Responses	420	100 %

This concludes our survey. Thank you for your time and answers.

37. GENDER (CODE BUT DO NOT ASK)

1 male	176	41.90 %
2 female	244	58.10 %
Total Responses	420	100 %

38. COUNTY

1 Dade (12025)	176	41.90 %
2 Broward (12011)	115	27.38 %
3 Collier (12021)	15	3.57 %
4 Lee (12071)	29	6.90 %
5 Monroe (12087)	6	1.43 %
6 Palm Beach (12099)	79	18.81 %
Total Responses	420	100 %

APPENDIX E

	Count	Percent
1. First, in your opinion, what is the most important issue facing South Florida today?		
1. Named some water issue (shortage, conservation, drought, etc.)	144	34.29 %
2. Named some other issue	226	53.81 %
9. DK	50	11.90 %
Total Responses	420	100 %
2. And what is the second most-important issue facing South Florida today?		
1 named some water issue (shortage, conservation, drought, etc.)	41	9.76 %
2 named some other issue	273	65.00 %
9 DK	106	25.24 %
Total Responses	420	100 %
3. In the past few weeks, have you seen any public service announcements or advertisements on radio or television talking about water?		
1 yes (ASK 4)	360	85.71 %
2 no (SKIP TO 6)	58	13.81 %
9 DK (SKIP TO 6)	2	0.48 %
Total Responses	420	100 %

4. What was the message saying about water?

1 restrictions on irrigating/washing cars/"Turn it OFF"	261	72.50 %
2 remember seeing/hearing something but not exactly sure what it was	88	24.44 %
9 DK	11	3.06 %
Total Responses	360	100 %

5. Do you recall the tag line or main message on the spots? (IF YES, ASK WHAT IT WAS.)

1 yes, "Turn it Off"	38	10.56 %
2 no	303	84.17 %
9 DK	19	5.28 %
Total Responses	360	100 %

6. In your opinion, is there a water shortage in South Florida now?

1 yes (ASK 7)	343	81.67 %
2 no (SKIP TO 10)	42	10.00 %
9 DK (SKIP TO 11)	35	8.33 %
Total Responses	420	100 %

7. How serious do you think the water shortage problem is for your community? Would you say very serious, somewhat serious, not very serious, or not at all serious?

1 very serious	224	65.31 %
2 somewhat serious	98	28.57 %
3 not very serious	12	3.50 %
4 not at all serious	1	0.29 %
9 DK	8	2.33 %
Total Responses	343	100 %

8. How long would you say the water shortage has been going on?

1 less than 6 months	189	55.10 %
2 6 months to 1 year	69	20.12 %
3 more than 1 year but less than 2 years	24	7.00 %
4 more than 2 years	43	12.54 %
9 DK	18	5.25 %
Total Responses	343	100 %

9. What would you say is the main cause of the water shortage: overuse of water, lack of rainfall, insufficient systems for storing excess water, or wasteful water use?

1 overuse (SKIP TO 11)	14	4.08 %
2 lack of rain (SKIP TO 11)	163	47.52 %
3 insufficient storage system(SKIP TO 11)	17	4.96 %
4 wasteful use (SKIP TO 11)	28	8.16 %
5 some combination of these (SKIP TO 11)	117	34.11 %
9 DK (SKIP TO 11)	4	1.17 %
Total Responses	343	100 %

10. Why do you think there is no water shortage?

1 it has been raining enough	3	7.14 %
2 there is enough water stored	7	16.67 %
3 some other reason	24	57.14 %
9 DK	8	19.05 %
Total Responses	42	100 %

11. The main message in the announcements is about mandatory restrictions on watering your lawn and washing your car, and unnecessary use of water. The tag line in the spots is "Turn it Off." Do you recall hearing these messages?

1 yes (ASK 12)	238	56.67 %
2 no (SKIP TO 13)	177	42.14 %
9 DK (SKIP TO 13)	5	1.19 %
Total Responses	420	100 %

12. Did these ads make you more likely or less likely to abide by the water restrictions, or did they not affect your attitude at all?

1 more likely	174	73.11 %
2 less likely	7	2.94 %
3 had no effect	54	22.69 %
9 DK	3	1.26 %
Total Responses	238	100 %

13. Do you make any special efforts to conserve water?

1 yes (ASK 14)	357	85.00 %
2 no (SKIP TO 16)	61	14.52 %
9 DK (SKIP TO 16)	2	0.48 %
Total Responses	420	100 %

14. What is the primary or main way you conserve water?

1 follow restrictions on irrigation	116	32.49 %
2 follow restrictions on washing my car	71	19.89 %
3 named some other conservation measure	168	47.06 %
9 DK	2	0.56 %
Total Responses	357	100 %

15. Why do you act to conserve water?

1 to save money	18	5.04 %
2 because we have a shortage	123	34.45 %
3 because of mandatory restrictions	46	12.89 %
4 because it's just good policy/the thing to do	139	38.94 %
5 some other reason	28	7.84 %
9 DK	3	0.84 %
Total Responses	357	100 %

16. Do you think it is necessary for people to conserve water to ensure that South Florida has enough water in the future, or do you think there are enough high quality sources of water to meet future needs?

1 necessary to conserve	359	85.48 %
2 enough sources available	35	8.33 %
9 DK	26	6.19 %
Total Responses	420	100 %

17. Now think about restrictions on water use. Do you think mandatory water restrictions are necessary to conserve water?

1 necessary	370	88.10 %
2 unnecessary	35	8.33 %
9 DK	15	3.57 %
Total Responses	420	100 %

18. Generally, do you abide by water restrictions all of the time, most of the time, or just some of the time?

1 all of the time	261	62.14 %
2 most of the time	119	28.33 %
3 some of the time	28	6.67 %
9 DK	12	2.86 %
Total Responses	420	100 %

19. From what you have seen, do you think your neighbors generally abide by the restrictions all of the time, most of the time, or just some of the time?

1 all of the time	110	26.19 %
2 most of the time	147	35.00 %
3 some of the time	96	22.86 %
9 DK	67	15.95 %
Total Responses	420	100 %

20. Since restrictions have been established for South Florida, would you say you have made significant changes in the way you use water?

1 yes	265	63.10 %
2 no	140	33.33 %
9 DK	15	3.57 %
Total Responses	420	100 %

21. From what you know, who faces the toughest restrictions on their water use: agriculture, businesses, or residential homeowners?

1 agriculture	191	45.48 %
2 business	24	5.71 %
3 homeowners	142	33.81 %
9 DK	63	15.00 %
Total Responses	420	100 %

22. One of the current restrictions has to do with when you can water your lawn. Currently watering is permitted between 4 AM and 8 AM only two days a week. Do you think most people abide by that restriction?

1 yes	209	49.76 %
2 no	151	35.95 %
9 DK	60	14.29 %
Total Responses	420	100 %

23. Do you think this restriction is necessary or unnecessary?

1 necessary	367	87.38 %
2 unnecessary	29	6.90 %
9 DK	24	5.71 %
Total Responses	420	100 %

24. Do you think this restriction is being properly enforced?

1 yes	153	36.43 %
2 no	159	37.86 %
9 DK	108	25.71 %
Total Responses	420	100 %

25. Is there any water use activity that isn't currently restricted but, in your opinion, should be restricted? (IF YES, WHAT?)

1 no	195	46.43 %
2 pressure washing	7	1.67 %
3 commercial car washing	40	9.52 %
4 golf course irrigation	29	6.90 %
5 other	63	15.00 %
9 DK	86	20.48 %
Total Responses	420	100 %

26. Are you aware of any government agencies that have been created to protect water resources? (IF YES, ASK THE NAME.)

1 named South Florida Water Management District	36	8.57 %
2 named some other agency	44	10.48 %
3 no	295	70.24 %
9 DK	45	10.71 %
Total Responses	420	100 %

27. Are you familiar with the South Florida Water Management District?

1 yes (ASK 28)	231	55.00 %
2 no (SKIP TO 30)	185	44.05 %
9 DK (SKIP TO 30)	4	0.95 %
Total Responses	420	100 %

28. Based on what you know about the water management district, would you say your opinion toward the district is very favorable, somewhat favorable, somewhat unfavorable, or very unfavorable?

1 very favorable	61	26.41 %
2 somewhat favorable	93	40.26 %
3 somewhat unfavorable	24	10.39 %
4 very unfavorable	9	3.90 %
9 DK	44	19.05 %
Total Responses	231	100 %

29. Some people say the South Florida Water Management District has done more harm than good in its work on the water shortage problem; others say the district has made a positive difference in helping to solve the water shortage problem. Which of...

1 done more harm than good	50	21.65 %
2 helped solve water shortage problem	110	47.62 %
9 DK	71	30.74 %
Total Responses	231	100 %

30. Do you think South Florida's water supply is very adequate, somewhat adequate, somewhat inadequate, or very inadequate to handle the growth in South Florida?

1 very adequate	37	8.81 %
2 somewhat adequate	132	31.43 %
3 somewhat inadequate	119	28.33 %
4 very inadequate	87	20.71 %
9 DK	45	10.71 %
Total Responses	420	100 %

31. From time to time, the water management district engages in educational efforts to promote water conservation. Do you think these efforts should or should not be continued in the future?

1 should be continued	373	88.81 %
2 should not be continued	25	5.95 %
9 DK	22	5.24 %
Total Responses	420	100 %

32. In the past, have you ever called the water management district's 1-800 number or visited the web site for more information about water issues?

1 called 1-800	6	1.43 %
2 visited web site	8	1.90 %
3 both	9	2.14 %
4 done neither	383	91.19 %
9 DK	14	3.33 %
Total Responses	420	100 %

33. For statistical purposes only, in which of the following categories does your age fall: 18 to 24, 25 to 34, 35 to 49, 50 to 64, or 65 or older?

1 18-24	35	8.33 %
2 25 to 34	59	14.05 %
3 35 to 49	103	24.52 %
4 50 to 64	98	23.33 %
5 65 or older	117	27.86 %
9 DK	8	1.90 %
Total Responses	420	100 %

34. What is the last year you completed in school?

1 less than a high school degree	36	8.57 %
2 high school graduate	126	30.00 %
3 some college	79	18.81 %
4 college graduate or more	170	40.48 %
9 DK	9	2.14 %
Total Responses	420	100 %

35. What is your race or national origin?

1 African American	48	11.43 %
2 Asian	2	0.48 %
3 Caucasian	229	54.52 %
4 Hispanic	97	23.10 %
5 other	26	6.19 %
9 DK/ refused	18	4.29 %
Total Responses	420	100 %

36. Finally, I am going to read you a list of categories that describes household income. Please just say the word "stop" when I read the category that best describes your total household income for 2000...

1 less than \$25,000	92	21.90 %
2 \$25,000 to 50,000	120	28.57 %
3 \$50,000 to 75,000, or	73	17.38 %
4 more than \$75,000	71	16.90 %
9 DK	64	15.24 %
Total Responses	420	100 %

This concludes our survey. Thank you for your time and answers

37. GENDER (CODE BUT DO NOT ASK)

1 male	176	41.90 %
2 female	244	58.10 %
Total Responses	420	100 %

38. COUNTY

1 Dade (12025)	176	41.90 %
2 Broward (12011)	115	27.38 %
3 Collier (12021)	15	3.57 %
4 Lee (12071)	29	6.90 %
5 Monroe (12087)	6	1.43 %
6 Palm Beach (12099)	79	18.81 %
Total Responses	420	100%

Appendix 8A-10: Second Research Study on Drought-Related Advertising Campaign (Public Poll)

Media Relations and Florida Government Performance
Survey Research Center at Florida State University

INTRODUCTION

The South Florida Water Management District (the District) contracted with Jay Rayburn, Ph.D., of the Florida Government Performance Survey Research Center at Florida State University to conduct two polls of residents residing in six of the District's counties: Dade, Broward, Palm Beach, Monroe, Lee and Collier. The distribution of respondents in each county approximately corresponds to the distribution of residence for that county as it appears in the total population.

The primary purpose of the first poll was to ascertain awareness of an advertising campaign currently being run by the District. Other issues covered in the poll include knowledge of water shortage in the counties, opinions and behaviors related to water restrictions, and opinions toward the District. The primary purpose of the second poll was to evaluate the awareness of the campaign at a second point in time, as well as to follow up on some of the issues in the first poll. The results of the first poll are available from the District.

In the second poll, a total of 409 interviews were conducted during September 2001. The description of the sample appears in **Appendix A**. A sample of this size has an approximate error rate of plus or minus 5 percent at the 95 percent level of confidence. This means that if everyone at least 18 years of age in the six counties had been interviewed, it is 95 percent certain the results would fall within plus or minus 5 percent of what the sample found.

Interviews were conducted in both English and Spanish. A copy of the English version of the questionnaire appears in **Appendix B**. A copy of the Spanish version of the questionnaire appears in **Appendix C**.

Appendix D displays the distribution of responses for each question. In this appendix, individuals who were not asked a particular question based on the answer to a previous question are identified as "system." Individuals who said they had no opinion or did not respond to a given question are identified as "missing." In the results displayed, the individuals who responded that they did not know are occasionally eliminated from the computations, and the percents of only those expressing an opinion are reported. All results reported are rounded to the nearest whole percent. Where appropriate, results for questions asked at both sampling points are displayed.

RESULTS

CAMPAIGN AWARENESS

* Respondents were initially asked what they thought were the first and second most important issues facing South Florida. The results (expressed as percents) displayed are for only those who expressed an opinion naming water as either the most or second most important issue.

	March	September
Most Important	39	19
Second Most Important	13	19
Total	52	38

Clearly, issues related to water were more important to respondents in March than they were in September. One plausible explanation would be the increased amount of rain recently, coupled with the recent lifting of restrictions. Another explanation was the events of September 11. May respondents volunteered this as the most important problem.

* Respondents at both sampling points were asked if they had seen something on television or had heard a radio spot about water.

	March	September
Seen/heard advertisements	86	53

As would be expected, recall of advertisements went down from March to September. In March, Stage 2 water restrictions were in place, and there was a severe shortage. By September, South Florida had received large amounts of rain, and the drought was no longer at the forefront of people's concerns (as demonstrated above). The events of September 11 and their effect on television programming probably also contributed to reduced recall.

* Of those who said they had seen or heard something about water, 33 percent said the advertisements were very effective, and 57 percent said they were somewhat effective.

WATER SHORTAGE ISSUES

Several questions concerning the perceptions of water shortage were asked at both sampling times. In the total sample:

82 percent thought there was a water shortage in South Florida during May

45 percent thought there was a shortage in September.

Below are the comparisons between the two sampling points for questions asked at both times. Results (expressed as percents) are for those who said they thought there was a shortage.

Questions:

How serious is the shortage?

	March	September
Very Serious	65	34
Somewhat Serious	29	51

How long has the shortage been going on?

	March	September
Less than 6 months	55	14
6 months to 1 year	20	44
More than 1 year	20	40

What has caused the shortage?

	March	September
Lack of rain	48	29
Wasteful use of water	8	11
Insufficient storage systems	5	10
Overuse of water	4	12
Some combination of the above	34	38

Why is there no shortage?

	March	September
It has been raining enough	*	64
Enough water stored	*	15
Some other reason	*	21

Do you make any special efforts to conserve water?

	March	September
Yes	85	83

* In March, too few people were asked this question to apply a statistical interpretation.

The perceived seriousness of water shortage dropped significantly (65 percent down to 34 percent) from March to September. The amount of rainfall, coupled with the perceived cause of the water shortage, accounted for this change. The perceived length of the water shortage further explains the drop in perceived seriousness of the shortage.

Individuals who said they made special efforts to conserve water were read a list of ways people can conserve water and were also asked how often they practiced that particular water conservation measure.

Watering lawn only when necessary

Frequency	Percentage
-----------	------------

frequently	52
occasionally	19
rarely	7
never	22

Watering during specific times

Frequency	Percentage
frequently	56
occasionally	11
rarely	8
never	25

Ensuring sprinkler system is working correctly

Frequency	Percentage
frequently	56
occasionally	9
rarely	3
never	32

Taking shorter showers

Frequency	Percentage
frequently	63
occasionally	18
rarely	8
never	12

Turning off water when shaving/brushing teeth

Frequency	Percentage
frequently	74
occasionally	12
rarely	6
never	8

Running washer only when load is full

Frequency	Percentage
Frequently	86
Occasionally	10
Rarely	2
Never	2
Method	percent

Checking and repairing leaks

Frequency	Percentage
Frequently	73
Occasionally	12
Rarely	6
Never	10

Installing low-volume fixtures

Frequency	Percentage
Frequently	45
Occasionally	7
Rarely	7
Never	41

Respondents in both surveys were asked why they conserved water, and if they thought it was necessary to conserve water now or there were already enough sources of water.

Question:

Reason for conserving water

	March	September
Good policy	39	47
Shortage	34	25
Mandatory restrictions	13	9
Save money	5	10

Ninety percent of all respondents thought it was necessary to conserve water now, while only 7 percent thought there were enough sources of water currently available.

Respondents were also asked how adequate they thought South Florida's water supply was.

Question:

How adequate is South Florida's water supply?

	March	September
Very adequate	9	10
Somewhat adequate	31	46
Somewhat inadequate	28	28
Very inadequate	21	17

WATER RESTRICTION AND ENFORCEMENT ISSUES

In the total sample:

28 percent thought there ought to be water restrictions only when needed

64 percent said they would prefer year-round restrictions

7 percent had no opinion

Several other questions relating to restrictions were asked at both sampling points.

Questions:

How often do you abide by restrictions?

	March	September
All of the time	62	63
Most of the time	28	31
Just some of the time	7	5

How often do your neighbors abide by restrictions?

	March	September
All of the time	26	30
Most of the time	35	34
Just some of the time	23	20

Do you think the current restrictions are being adequately enforced?

	March	September
yes	36	53

Are you in favor of more or less enforcement?

	March	September
More	*	61
Less	*	20
Don't know	*	19

* not asked in March

Finally, respondents were asked who in the household made the decision about watering.

Question

Who makes the decision about watering in your household?

	September
Male	35
Female	26
Joint decision	16
Lawn service	5
Someone else	19

CONCLUSIONS

Based on the findings above, the following conclusions are offered.

Although the drought as an issue was not as prevalent in September as it was in March, more than 33 percent of all participants still said it was the most or second most important issue facing South Florida.

Of those who recalled a message relating to water, 33 percent said the message was very effective, and slightly more than 50 percent said somewhat effective.

In the total sample, 82 percent thought there was a water shortage in South Florida in March. This number fell to 45 percent by September, but by this time South Florida had experienced significant rainfall.

Of those who said they thought there was a shortage, 94 percent said the problem was either very serious or somewhat serious in March, and 85 percent said the same in September. At both points, more than 4 in 5 respondents said they made special efforts to conserve water.

In the total sample, 10 percent said South Florida's water supply was very adequate, and 46 percent said it was somewhat adequate.

In the total sample, 83 percent said they made special efforts to conserve water. The most frequent methods of conserving water were running the washer only when there was a full load (86 percent); turning off water when shaving or brushing teeth (74 percent); checking and repairing leaks (73 percent); and taking shorter showers (63 percent).

In the total sample, 90 percent thought it was necessary to conserve water now; 94 percent said they abided by the restrictions either all or most of the time; 53 percent said they thought current restrictions were adequately enforced; and 61 percent favored more enforcement of restrictions.

When asked their preference, 64 percent said they would favor year-round restrictions over restrictions only when necessary.

The concluding paragraph of the March report states:

“Although the message seems to have penetrated the market, one word of caution is appropriate. While a significant number of respondents say they have heard the messages and believe the water shortage is a serious problem, a significantly smaller number say they have actually made changes in the way they use water. They also say a much smaller percent of their neighbors follow the restrictions. The District may want to strengthen the restrictions message, emphasizing the consequences for not abiding by the restrictions. Respondents acknowledge the necessity for restrictions, but some question arises as to the extent they are actually following these restrictions.”

While results here would support strengthening enforcement of regulations, today there is not a clear need for such enforcement. South Florida has experienced significant rainfall since March, and the supply is adequate for the present time. What is clear, however, is that respondents would favor year-round restrictions over restrictions only when they are necessary. Given the perception for the need to conserve water, and the less-than-adequate supply of water, residents seem to opt for some method that would guarantee a steady, dependable water supply.

APPENDIX A

DEMOGRAPHICS

Age

	March	September
18 to 24	8	9
25 to 34	14	45
35 to 49	25	17
50 to 64	23	11
65 or older	28	18
Refused to answer	2	<1

Education

	March	September
Less than high school diploma	9	7
High school diploma	30	25
Some college	19	26
College graduate or more	40	38
Refused to answer	2	3

Race

	March	September
African American	11	13
Asian	<1	2
Caucasian	55	44
Hispanic	23	26
Other	6	13
Refused to answer	4	2

Income

	March	September
Less than \$25,000	22	14
\$25,000 to \$50,000	29	23
\$50,001 to \$75,000	17	25
More than \$75,000	17	20
Refused to answer	15	19

Gender

	March	September
Male	42	39
Female	58	61

County of Residence




	March	September
Miami-Dade	42	39
Broward	27	28
Collier	4	5
Lee	7	8
Monroe	1	1
Palm Beach	19	19

Lived in South Florida

length	percentage
Less than 1 year	7
1 to 8 years	20
9 to 15 years	17
16+ years	55
No answer	1

Appendix 8A-11: District's Website Elements on Water Shortage






FREQUENTLY ASKED QUESTIONS ABOUT WATER RESTRICTIONS

PHASE II Restrictions, in brief, limit lawn watering and car washing to TWICE a week, from 4-8 a.m., on:

- ▶ **Wednesdays and Saturdays** for those with home addresses ending with **ODD** numbers (1,3,5,7,9)
- ▶ **Thursdays and Sundays** for those with home addresses ending with **EVEN** numbers (0,2,4,6,8) or those with no number in the address.
- ▶ **Hand watering** (with a hose with a shut-off nozzle) is allowed on the above days, from **5-7 p.m.**



Download free plug-in to view the **PDF** "Portable Document Format" files on this page.

Q Where can I get more detailed information about PHASE 2 restrictions?

A View, or download and print:
[PHASE 2 - Residential Restrictions](#) **PDF** (2 pages, 168 KB) OR
[PHASE 2 - Commercial Restrictions](#) **PDF** (2 pages, 180 KB)

Q Where can I get more detailed information about PHASE 2 restrictions?

A View, or download and print:
[PHASE 2 - Residential Restrictions](#) **PDF** (2 pages, 168 KB) OR
[PHASE 2 - Commercial Restrictions](#) **PDF** (2 pages, 180 KB)

Q Why are most of the available publications in a PDF format? I have trouble viewing/downloading these files on my computer?

A PDF files are considered to be the standard for the internet/world-wide web, and the Adobe download is FREE and works well for most people. These PDF files are best viewed with [Adobe Acrobat Reader](#) 4.0 or higher. However, because we have heard that some visitors are unable to use this format, we are in the process of making all of the publications that NOW are in a PDF format also available in simple html. These html files should be available by the end of February 2001.

Meanwhile, if you would like any of these publications mailed to you at your home or office, [Click here to contact our Public Affairs Office](#), and be sure to give them your postal mailing address along with your e-mail request for these publications.

Q Do the lawn watering restrictions apply to homeowners who use water taken from a WELL, or from a LAKE or CANAL (rather than water from a utility) to water their lawns?

A Yes, the restrictions DO apply to people using water drawn from private wells, canals, ditches, lakes, ponds and rivers. Why? Because water drawn from these sources comes from the same place as the water distributed by cities and utilities -- initially from water accumulating in lakes, wetlands, rivers and other waterways -- which eventually makes its way into our aquifers/ground water. All of that water comes from rainfall, which has been, and will continue to be (at least for several months), very scarce.

Q I have a COMMERCIAL VEHICLE that I wash regularly at my home. Do residential or commercial restrictions apply?

A If you wash any vehicle at your home, residential restrictions apply. You might want to consider using a commercial car wash during this restriction phase, as they are required to conserve and recycle water. If car-washing at a residence is done by a person licensed to wash vehicles, it is permitted, but, it must be done using a bucket and hose with a shut-off nozzle and must be done on, or draining to, a non-paved surface.

Q Is everyone, including businesses and farmers, being required to conserve water?

A Yes. PHASE II residential restrictions call for a 30% reduction in day-to-day normal water demand. Using water outside the home -- for landscapes, car washing, driveway cleaning, etc.-- is the primary residential use of water. During mandatory water restrictions, agriculture (including nurseries) also has specific restrictions. Water-restrictions apply to businesses, shopping centers, government buildings, street medians, parks, golf courses and other recreation facilities as well.

Q When can I wash my CAR?

A Residential washing of cars, boats and other equipment is permitted from 4 to 8 a.m. and from 5 to 7 p.m. on your landscape watering days. Washing must be done on, or must drain to a non-paved surface (such as your lawn), because this allows the water to soak into the ground, replenishing aquifers. Be sure to use a hose with an automatic shut-off valve.

Q Are there any restrictions on PRESSURE CLEANING?

A All pressure treatment systems are low volume, regardless of the stated psi. Still, during a water shortage, these systems should only be used where needed. For example, using a pressure treatment system for routine cleaning of your driveway or sidewalk is DISCOURAGED. Most of these surfaces can be cleaned just as effectively with a broom or rake, which saves water. However, pressure treating (either by yourself or by a professional) to prepare your house, roof, sidewalks, driveways, shutters, etc. for painting or sealing can be done at any time.

Q I work/volunteer at our local FIRE DEPARTMENT. Are there restrictions on washing our trucks?

A Fire Departments can wash their trucks anytime, after fires. Routine cleaning of fire trucks should be limited to the specified address times, and should employ low-volume methods (shut-off valves on hoses).

Q My homeowners association (HOA) has irrigated common areas which fall within both odd and even addresses. On which days should we irrigate?

A If your HOA has an office within the development, the days you irrigate are based upon the address of the office location (odd or even). If there is no on-site office with its own address, you should irrigate on the days for "even" addresses: Thursday and Sunday. For properties greater than five irrigated acres in size, you can water between midnight and 8:00 a.m. on each of the prescribed two days. This 8-hour period should be sufficient for the irrigation of all zones within most HOA properties. Smaller properties can water between 4:00 and 8:00 a.m. on each of the two days.

If you feel you cannot meet these restrictions, your next step is to apply for a variance. You may request a variance application form by contacting our Water Shortage Phone Bank at 800-662-8876. For more information on [variances](#), [see this page](#) on our web site.

Q Isn't there ENOUGH WATER in the coastal aquifers and the Everglades to meet the region's water needs?

A South Florida is flat and our geography sentences us to almost total dependence on rainfall for most of our water supply. While it rains in one area, it may not be raining in an adjacent area. While coastal water levels are close to normal now, the dry season (November to May) is predicted to be drier than normal. Water levels throughout the region are unusually low because the rainy season this year delivered only about half the usual rainfall. The back-up water supply for both agricultural and urban areas comes from Lake Okeechobee.

Q I noticed that hand watering is limited to 5-7 pm. EVENING WATERING of many plants can lead to crown rot and a whole host of diseases. Will it be OK to water by hand from 4 a.m. to 8 a.m. on the days allowed by my address?

A Yes, you can hand water your plants from 4 a.m. - 8 a.m. -- on the days of the week allowed for your address. You might also want to check into low-volume irrigation devices that feed water directly to a plant's roots. Low-volume systems are exempt from restrictions, although voluntary cutbacks in water-use are encouraged.

Q What else can I do to conserve water, beyond following the restrictions in place where I live?

A There are a lot of ways you can conserve water, by making small changes in the way you use water in your home, at work, or outdoors. See "[50 Ways to Be Water Smart](#)," a sensible guide to water conservation.

Q I'm not sure I can comply with the restrictions, and need a VARIANCE. Who do I talk to?

A Your first step is to get a variance application form. Instructions for how to fill it out and where to send it are included with the form. Your application will be reviewed by South Florida Water Management District staff. Approval or denial is based on the criteria listed in the [Water Shortage Plan Rule](#). For more information on [variances](#), [see this page](#) on our web site.

Q Can my group/organization hold CHARITY CAR WASH events to raise funds?

A Yes, as long as your group uses a bucket and sponge to wash vehicles, and to rinse uses hoses with automatic shut-off valves -- or uses low-volume pressure cleaning equipment. You should also make sure that the car washing is done on, or must drain to a non-paved surface (such as your lawn), because this allows the water to soak into the ground, replenishing aquifers.

[Click here for a copy of a letter](#) from the SFWMD outlining these conditions that you can use for likely sponsors of your Charity Car Wash.

Q I have seen VIOLATIONS of the water restrictions. Where can I report this problem?

A Local governments are enforcing the restrictions. Each local government designates who, and how enforcement will be administered in their area. [Click here](#) to find out how you can help make sure what restrictions apply to all users, and see a list of your county/city water restriction violation enforcement contacts.

Q I have a COMMERCIAL BUSINESS that requires me to use water at times when residential users aren't allowed to use water. Where can I find guidelines for commercial use of water?

A There is a publication outlining [PHASE 2 Commercial Restrictions](#) [PDF](#) (2 pages, 180K). In addition, commercial, business and recreational users can read the full emergency orders for each geographic area currently under water shortage restrictions at "[Official Notices](#)" web page. You can read the entire Water Shortage Plan (Florida Administrative Code 40E-21) at the "[Rules and Forms](#)" web page.

Q When IT'S RAINING and the weather report calls for more rain, why do we remain in water restrictions?

A Rainfall in South Florida is often very localized, sometimes raining on one side of the street and not on the other, or in one area but not regionally. All areas in the South Florida region depend on the same interconnected system of ground and surface water, with Lake Okeechobee being the backup water supply for most of the region. The [Climate Prediction Center of NOAA](#) is forecasting dry times ahead for the next six to nine months. We need to be prepared for this winter and spring -- the dry season. Lake Okeechobee will have to be tapped to provide water for all the region and Lake Okeechobee begins the dry season below normal. To balance the needs of the region, the District is required to consider the environmental needs of the region as well as urban and agriculture needs. If you would like to see technical details of the effects of rainfall events on long-term water levels, you can visit the [US Geological Service's site](#). Click on the location of interest to you on the map you will find on this site to get water-level information.

Q Are there any LONG-RANGE PLANS to address water conservation and also to alleviate flooding?

A The District, the U.S. Army Corps of Engineers, local governments, utilities, agriculturists, environmentalists, and others are implementing the Comprehensive Everglades Restoration Plan (CERP). This is a monumental plan with many projects to build and manage a more efficient system that can capture and store water that is now lost to sea. The project will help to restore the Everglades while meeting the water needs for a growing population for the next 50 years.

► *Can't find the answer to YOUR question?*
Please [e-mail us with your question](#), and we will e-mail you a response.

Water Conservation and Citizens' Information Line
Call 1-800-662-8876

Emergency Operations Center Permit Holders' Operations Line
Call 1-800-544-2323

[Water Shortage Home](#) || [SFWMD Service Centers](#) || [Related Sites](#) || [Legal Documents](#)

[who to contact](#) • [site map](#) • [search](#) • [webmaster](#) • [site design](#) • [home](#) • [email](#)

Use of information herein constitutes acceptance of our [disclaimer](#).